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ENTREPRENEURSHIP POLICY FRAMEWORK AND IMPLEMENTATION GUIDANCE





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PREFACE

Private sector development has become an important part of development policy. Until recently, however, policymakers around the globe as well as in international organizations adopted a narrow perspective of the challenges involved, focusing in particular on efficiency gains in existing enterprises. In the face of rapid social and technological change, slow economic recovery and jobless growth, many countries have shifted the focus of their policies to facilitating new firm creation. With the inclusion of entrepreneurship as part of the development policy agenda there is an opportunity to better link private sector development to the goals of inclusive and sustainable development.

The Entrepreneurship Policy Framework developed by UNCTAD is, therefore, a timely contribution as it aims to assist policymakers in identifying the key elements of an entrepreneurship policy and formulating actions. It also provides policy options that will help developing countries and countries in transition to stimulate inclusive and sustainable growth. While cautioning that one-size does not fit all, the policy recommendations are clearly stated and are accompanied by practical checklists, an inventory of selected examples and monitoring indicators. It is the result of the work of the Multi-Year Expert Meeting on Enterprise Development and Capacity Building on Science, Technology and Innovation, in the spirit of the Accra Accord and in preparation of UNCTAD XIII. I would like to highlight four design principles that underpin the findings in this document:

- **1. Consensus building**: development partners should contribute to a national entrepreneurship strategy that is the result of extensive consultation between the government and representatives of all sectors of business activity, local communities, education and financial institutions.
- 2. Sustainability: poverty reduction, gender equality and environmental protection are core goals.
- **3. Implementation**: multiple ministries, as well as implementing agencies from the private sector and civil society should be identified and their role clearly defined.
- **4. Monitoring and evaluation**: the periodic measurement of policy effectiveness is essential for the management of entrepreneurship policy and should incorporate feedback from lessons learnt on an on-going basis.

With these guiding principles, support for entrepreneurship in developing countries and economies in transition can enhance efforts, not only to build robust enterprise sectors, but to generate growth with social and economic inclusion.

N. Paufodi

Supachai Panitchpakdi Secretary-General of UNCTAD

TABLE OF CONTENTS

I. INTRODUCTION	1
II. UNCTAD'S ENTREPRENEURSHIP POLICY FRAMEWORK	5
1. Formulating National Entrepreneurship Strategy	5
2. Optimizing the Regulatory Environment	14
3. Enhancing Entrepreneurship Education and Skills Development	22
4. Facilitating Technology Exchange and Innovation	30
5. Improving Access to Finance	36
6. Promoting Awareness and Networking	44
III. PUTTING THE ENTREPRENEURSHIP POLICY FRAMEWORK INTO PRACTICE	51
IV. ANNEX: INDEX OF SELECTED POLICIES AND INITIATIVES	55
FIGURES	
1. The focus of the UNCTAD's Entrepreneurship Policy Framework	1
2. UNCTAD's Entrepreneurship Policy Framework	2
3. Structure of UNCTAD's Entrepreneurship Policy Framework	
and Entrepreneurship Policy Toolkit	3
TABLES	
II.1. Formulating National Entrepreneurship Strategy	5
	5
II.2. Optimizing the Regulatory Environment	14
II.2. Optimizing the Regulatory Environment II.3. Enhancing Entrepreneurship Education and Skills Development	-
II.3. Enhancing Entrepreneurship Education and Skills Development	14
II.3. Enhancing Entrepreneurship Education and Skills Development II.4. Facilitating Technology Exchange and Innovation	14 22 30
II.3. Enhancing Entrepreneurship Education and Skills Development	14 22

I. INTRODUCTION

An entrepreneur is an individual who identifies opportunities in the marketplace, allocates resources, and creates value. Entrepreneurship—the act of being an entrepreneur,—implies the capacity and willingness to undertake conception, organization, and management of a productive new venture, accepting all attendant risks and seeking profit as a reward. In economics, entrepreneurship is sometimes considered a factor of production, at par with land, labour, natural resources, and capital.

As such, entrepreneurship is a vital component of economic growth and development. The creation of new business entities not only generates value added, fiscal revenues, employment and innovation, but is an essential ingredient for the development of a vibrant small- and medium-sized business sector—the core of most competitive economies. It has the potential to contribute to specific sustainable development objectives, such as the employment of women, young people or disadvantaged groups. Growth-oriented entrepreneurs can also contribute to structural transformation and building new industries, including the development of eco-friendly economic activities.

UNCTAD's Entrepreneurship Policy Framework aims to support developing-country policymakers and those from economies in transition in the design of initiatives, measures and institutions to promote entrepreneurship. It sets out a structured framework of relevant policy areas, embedded in an overall entrepreneurship strategy that helps guide policymakers through the process of creating an environment that facilitates the emergence of entrepreneurs and start-ups, as well as the growth and expansion of new enterprises.

The framework recognizes that many countries may not, as yet, have a dedicated 'national entrepreneurship strategy'. The promotion and facilitation of new enterprise is often, implicitly or explicitly, part of an overall private sector or enterprise development strategy that encompasses broader objectives related to the creation of productive capacity, including regulatory reform, infrastructure development, human resource and skills development, or small and medium size enterprises (SME) policies (figure 1).

Policymakers have at their disposal a large body of existing research and policy guidance (from UNCTAD and other institutions) to help them devise such broader national policies and to create a general business environment conducive to enterprise development. The Entrepreneurship Policy Framework is narrower in scope and focuses specifically on policies aimed at promoting the emergence of new entrepreneurs and facilitating new business start-ups in developing countries and transition economies. Given this focus, the framework also pays attention to how entrepreneurship policy interacts with broader private sector development and general economic policies, as well as policies that contribute to improve the business climate. The framework aims to help policymakers to formulate policies to promote entrepreneurship across all sectors and industries, independent of the level of innovation, and including profit-seeking ventures and those with social entrepreneurship objectives. It also acknowledges the importance of the informal sector, although policy initiatives aimed at facilitating entrepreneurship will, by necessity, tend to promote formal business start-ups or transitions out of informality.

The overarching goal of the *Entrepreneurship Policy Framework* is to contribute to inclusive and sustainable development in developing countries and economies in transition. Sustainable development



Source: UNCTAD.

is captured by the United Nations Millennium Development Goals that are embedded in each of the areas of the framework, including poverty reduction, gender equality and environmental sustainability, among others. In addition, the United Nation's High Level Panel on Global Sustainability (2012) provides guidelines to forge inclusive and sustainable growth and create value beyond narrow concepts of profit. In this regard, entrepreneurship policy can be a catalyst to achieve these inclusive and sustainable development objectives. It can enhance productivity growth and help find practical business solutions to social and environmental challenges (e.g. developing eco-friendly economic activities or employing women, young people or disadvantaged groups).

Entrepreneurship policy cannot, of course, be treated entirely separately from broader economic development policies. Coordination and coherence are essential in order to achieve a positive impact, to benefit from the synergies of these policies, and to maximize the economic and social growth they can provide. This requires a "whole of government" approach with strong commitment at top ministerial level and coordination across ministries, in partnership with the private sector and other civil society stakeholders, including academia, NGOs, and community organizations. In an effective entrepreneurial ecosystem, multiple stakeholders contribute to facilitating entrepreneurship. It is a system of mutually beneficial and self sustaining relationships involving institutions, people and processes that work together with the goal of creating entrepreneurial and innovative ventures. It includes business (large and small firms as well as entrepreneurs), policymakers (at the international, national, regional and local levels), educational institutions (primary, secondary and higher education), social networks and other civil society actors.

The framework recognizes that in designing entrepreneurship policy "one size does not fit all". It highlights the key policy areas to take into account and suggests policy objectives and options in the form of recommended actions in each area. Although the national economic and social context and the specific development challenges faced by a country will largely determine the overall approach to entrepreneurship development, UNCTAD has identified six priority areas for policy focus that have a direct impact on entrepreneurial activity. These are: (1) formulating national entrepreneurship strategy; (2) optimizing the regulatory environment; (3) enhancing entrepreneurship education and skills; (4) facilitating technology exchange and innovation; (5) improving access to finance; and (6) promoting awareness and networking (see figure 2).

This document offers guidance on the specific issues that require examination and assessment under each area. It identifies selected policy options that will enable policymakers to begin the strategy formulation process, and it proposes checklists and numerous references in the form of case studies and best practices that provide further guidance on



the strategic process and its implementation. These case studies are intended to equip policymakers with implementable recommendations to create the most conducive and supportive environment for entrepreneurs to thrive. This document concludes with a brief user guide, or a step-by-step approach to developing entrepreneurship policy, and it also contains an illustrative set of indicators that can measure progress toward strategic goals and objectives.

Although this document presents first and foremost a policy framework (as its title suggests), due to the practical 'step-by-step' approach taken, the checklists of questions, and the methodology and indicators to measure policy effectiveness, combined with the availability on UNCTAD's web-site of an online inventory of best practices in entrepreneurship development, it can be considered as a toolkit for policymakers in the formulation, implementation and measurement of entrepreneurship policies. The toolkit-logic is represented in figure 3. The policy framework and its toolkit elements include the work of four UNCTAD Inter-governmental Multi-Year Expert Meetings held from January 2009 to January 2012 as well as a series of international expert meetings organized by the Secretariat. It represents a baseline document for UNCTAD to assist policymakers in evaluating the state of entrepreneurship in a specific country, and to make sound policy recommendations. It is also meant to serve as a useful document to foster policy dialogue on entrepreneurship. In order to accommodate suggestions and improvements that may result from such dialogue, the Entrepreneurship Policy Framework has been designed as a "living document". UNCTAD will aim continuously to integrate learning from technical assistance work on entrepreneurship development. Finally, the online inventory of best practice policies will provide the opportunity for all stakeholders to contribute cases, examples, comments and suggestions, as a basis for the inclusive development of future entrepreneurship policies.

Figure 3. Structure of UNCTAD's Entrepreneurship Policy Framework and Entrepreneurship Policy Toolkit

Key policy areas of the EPF

Policy objectives and recommended actions for each policy area On-line Inventory of Best Practice Policies to support policy formulation[®]

User guide and method for policy monitoring and evaluation

Source: UNCTAD.

II. UNCTAD'S ENTREPRENEURSHIP POLICY FRAMEWORK

1. Formulating National Entrepreneurship Strategy

1.1. Introduction

Entrepreneurship is one of the most important drivers of job creation and economic growth, and is crucial for the development of a vibrant formal small- and medium-sized (SME) business sector. It enhances productivity growth and can also help find practical business solutions to social and environmental challenges, including climate change. Despite its importance, entrepreneurship is not always actively encouraged in all developing countries through dedicated policy initiatives. Both economic theory and practice demonstrate that entrepreneurship may generate social gains beyond private gains. A proactive role of governments in supporting entrepreneurship is, therefore, justified and it requires a systemic approach.¹ This section explores key elements of a national entrepreneurship strategy (table II.1).

1.2. Policy objectives and recommended actions

a. Identify country-specific challenges

National Entrepreneurship Strategies need to be tailored to each country's specific conditions. It is therefore important to clarify how entrepreneurship is expected to contribute to overall national development objectives and where policies should intervene to achieve those objectives. Which policy package is the most appropriate depends on the existing level of entrepreneurship in a given country and its structural characteristics. The rate of start-ups relative to the size of the workforce and the level of innovation of startups vary considerably between countries. When the number of start-ups is low, incentives may be helpful to encourage more people to create their own business;

TABLE II.1. FORMULATING NATIONAL ENTREPRENEURSHIP STRATEGY		
POLICY OBJECTIVES	RECOMMENDED ACTIONS	
a. Identify country specific challenges	 Map the current status of entrepreneurship in the country Identify country-specific entrepreneurship opportunities and challenges 	
b. Specify goals and set priorities	 Define strategies to achieve specific goals and reach specific target groups Develop and prioritize actions 	
c. Ensure coherence of entrepreneurship strategy with other national policies	 Align entrepreneurship strategies with overall development strategy and other private sector development strategies Manage interaction and create policy synergies 	
d. Strengthen the institutional framework	 Designate a lead institution Set up an effective inter-agency coordination mechanism and clarify mandates Engage with the private sector and other stakeholders Ensure business-like service delivery 	
e. Measure results, ensure policy learning	 Define clear performance indicators and monitor impact Set up independent monitoring and evaluation routines Incorporate feedback from lessons learnt 	

Source: UNCTAD.

when the number is already high, entrepreneurship policy could focus on helping firms stabilize and grow.

Typically, low-income countries have a very high share of own-account workers in their workforce. Many of these can be classified as necessity entrepreneurs, that is, individuals that are pushed into entrepreneurship because they have no better alternatives for work, reflecting the scarcity of decent wage-labour opportunities in the economy. In wealthier societies, the rate of necessity entrepreneurship tends to be lower, and start-ups are set up because their founders perceive a rewarding business opportunity. Depending on the types of entrepreneurship prevalent in a country, the need for public support is very different.

In developing countries, the private sector is often highly segmented, with a large informal sector. Different policies are needed for enterprises at the high and low end of the spectrum. At the high end, it may be necessary to encourage start-ups that explore business concepts and markets that are new to the country, thereby increasing the range of business options for other investors. These start-ups are important for creating and enhancing national competitive advantages. At the low end, new business opportunities need to be explored that are accessible for the poor and unskilled workforce with its limited assets. Depending on each country's major challenges, special entrepreneurship programmes for youth employment, for rural areas, for women or specific ethnic groups may be of strategic importance.

The informal sector is often an important part of the economy. Its development contribution can be significant, as informal self-employment is often the only opportunity for poor and unskilled members of the workforce to earn a living. However, informality typically goes hand in hand with small scale and relatively low productivity. Apart from the obvious fact that informal businesses bring no fiscal revenue to the State to finance development, informality can itself act as a constraint to enterprise development, because nonregistered firms often find it difficult to access finance or basic infrastructure services (e.g. electricity) and they operate in an environment of insecurity where contracts cannot always be enforced. Entrepreneurship development benefits from rules and regulations that are simple and transparent. Rules may differentiate between micro, small and large firms but enforcement should be ensured across the board to avoid unfair competition, while safeguarding the interests of informal

"necessity entrepreneurs" (those who run their own informal business as their only means to earn a living) and helping them to upgrade their business.

Entrepreneurship may be held back by very different factors. It is important to map the current status of entrepreneurship in the country and identify what the main challenges and opportunities are. Some governments may emphasize gaps in their education systems, which fail to develop the necessary managerial and technical skills, or which may not be sufficiently supportive of creativity and experimentation; other governments may find that existing business regulations are too complicated and discourage startups; and in some situations, the financial system may be identified as the most severe bottleneck. The relevance of constraints may vary fundamentally within countries. Certain types of firms may have easy access to finance, whereas others do not; some activities may be held back by difficulties in enforcing contracts, whereas for others, getting a business license is the main difficulty; and some regions may encourage entrepreneurship more than others (box 1).

b. Specify goals and set priorities

Based on the analysis of structural characteristics and binding constraints, it is important to specify the *goals* of a National Entrepreneurship Strategy. Entrepreneurship policies may pursue a variety of objectives and therefore set priorities differently. They may, for example, put emphasis on modernizing agricultural societies; leapfrogging into next generation technologies; increasing and diversifying exports; creating new economic opportunities for women; boosting youth employment; overcoming ethnical divides; or re-integrating ex-combatants in postconflict countries into civil life.

The specific objectives identified drive all other aspects of the national entrepreneurship strategy, from the institutional set-up to the specific policy instruments used. For example, if the main purpose is to support start-ups that develop technologies and markets new to the country, then it makes sense to locate the respective programme under the Ministries of Science and Technology or Ministries of Industry and Trade. Appropriate instruments would include technology incubators, venture capital funding, networks of business mentors, national business plan competitions, or programmes that allow nascent entrepreneurs to become familiar with export

Box 1. Examples of selected policies and initiatives to identify country specific challenges

Latin America & the Caribbean: The Latin American and Caribbean Economic System (SELA) is a regional, intergovernmental organism which provides a platform for consultation and the adoption of common positions on key economic issues in the region. In 2010, SELA produced a report entitled, "Developing Women Entrepreneurs: the necessity to reorient gender policies and programmes in SME development." Based on a survey, the document identified existing barriers to women entrepreneurs in the region, including a lack of access to finance and to information technology, a difficulty in achieving a work-life balance and negative cultural perceptions and stereotypes about women entrepreneurs. Policy recommendations were identified as well as best practices at the national and regional levels to facilitate the integration of women in formal entrepreneurship.

South Africa: Since 2009, Endeavor South Africa, in collaboration with First National Bank and the Global Entrepreneurship Week initiatives of the Kaufmann Foundation, started a series of Entrepreneurial Dialogues including an annual "State of Entrepreneurship in South Africa Summit." The events bring together policymakers, academics, entrepreneurs, SME support agencies and fund providers. In the three editions of the Summit which have taken place, the topics discussed included strategies for the future, the unique challenges facing South African entrepreneurs in key sectors and the archetypes of an entrepreneurial culture.

Ghana: The formulation of the Ghana Private Sector Development Strategy in 2010 has been accomplished through a comprehensive and inclusive process based on analysis and wide consultation with stakeholders in Ghana, in order to ensure that it is a broad-based policy embraced by all stakeholders. The exercise was carried out in six sequential phases. Round tables and consultations involved the Government Ministries, Public Sector Implementing Agencies, Private Sector, Educational Institutions, Research Institutions and Civil Society. They afforded stakeholders the opportunity to make recommendations, deselect some of the policy options and add new ones.

Source: UNCTAD Inventory, www.unctad.org/epf

markets, for example, through participation in fairs or organization of export consortia.

At the low end of the productivity spectrum, the challenge is often to encourage business ideas and ambition among informal micro enterprises. Among those enterprises, product quality and managerial skills are often important factors that deter upgrading and growth. Establishing vocational training centres in micro enterprise clusters with the aim of supporting young entrepreneurs to move into more sophisticated product categories and market segments can be effective. Furthermore, reducing the cost and hassle of business registration can encourage micro enterprises. Last, but not least, setting up "industry clubs" that include both large and small firms, and that organize information-sharing on practical management issues, such as good manufacturing practices, is a way of bringing new ideas into business communities at the low end of the productivity spectrum.

If a country has a strongly fragmented private sector, with some large enterprises, often multinational firms, that are typically capital-intensive and/or export-oriented, and a large segment of micro and small firms, then the government may select a focus on business linkages programmes that open up new opportunities for nascent firms. One way of achieving this is to encourage large firms to carry out regular supply-chain opportunity workshops where they inform small businesses or founders of new companies about business opportunities in their supply chain. In some countries, large companies are given incentives by government agencies to nurture small firms as service providers. Also, industrial parks may reserve some small premises for future suppliers who will cater to needs of large firms in the park. It may also be appropriate to closely coordinate trade and investment promotion with SME promotion. This may create win-win opportunities, as investors are assisted in developing efficient local business linkages which make them less dependant on imports while opening up new opportunities for local entrepreneurs.

Many countries have set up special entrepreneurship development programmes for women. This is based on the observation that women may be discriminated against in the workforce and among entrepreneurs in particular, although they often have a good education and manage their business very responsibly. In some countries, the regulatory environment still discriminates against women; and in most countries, cultural norms make it more difficult for women to set up and run their own businesses. Many governments, therefore, promote women entrepreneurship – both to tap into their potential as founders of dynamic enterprises and as a way of empowering women in society.

In other countries the workforce is very young, with large numbers of youth entering the labour market each year. When the formal labour market cannot absorb the additional labour force, special programmes may be needed to encourage youth entrepreneurship. Such programmes may build on specific instruments that can range from emphasizing management training in the education system to coaching of young would-be entrepreneurs by experienced investors.

Some countries are also implementing specific programmes to empower groups of their national population that have reduced entrepreneurial opportunity due to inherited ethnic imbalances. Here, supporting entrepreneurship is part of affirmative action programmes.

Entrepreneurship policies can also generate inclusive and sustainable development outcomes, along the recommendations of the UN High Level Panel on Global Sustainability (2012).² Projects in areas such as social housing, clean water for rural communities, waste management, health services for the poor, micro-finance in low-income areas or biodiversity conservation need investors who are interested in generating social or environmental value, beyond financial returns. This requires dynamic entrepreneurs who are creative in achieving social impact and committed to the goal of making production and consumption more sustainable. Social entrepreneurship can be facilitated by policymakers, through the adoption of target measures in all six areas of the framework (box 2).

National Entrepreneurship Development Strategies need to spell out which of the above objectives (or others) they want to achieve and to define priorities.

Box 2. Promoting social entrepreneurship

Social enterprises are entrepreneurial endeavours, which can take various legal forms, and pursue social as well as economic goals. In many developing countries and economies in transition, social entrepreneurs get involved in the provision of public services, primarily seeking to generate "social value" beyond profits. Contrary to strictly non-profit organizations, they do combine financial sustainability and the generation of economic returns to investment with the goal of serving the community, reducing inequality or enhancing social cohesion. They may also pursue environmental sustainability goals.

Social entrepreneurship can be promoted by incentives to invest in social or environmental credit schemes, by policies providing guarantees or risk insurance for specific projects, as well as by partnering arrangements such as public-private sector partnerships that mitigate the risk and adjust the rates of return of social investment funds, if needed. In some key areas of the Millennium Development Goals, related to renewable energy, health and education, governments may also prepare a pipeline of ready-to-invest projects, characterized by pre-cleared approval procedures, which would encourage investors and entrepreneurs to address local market needs in a responsible manner. The table below includes some examples of projects related to inclusive and sustainable development:

Selected examples of social entrepreneurship activities		
Social dimension	Environmental dimension	
- Access to clean water	- Biodiversity conservation	
- Access to energy	- Energy and fuel efficiency	
- Access to financial services	- Natural resources conservation	
- Access to education	- Pollution prevention	
- Access to affordable housing	- Waste management	
- Access to health services	- Sustainable energy	
- Disease prevention and mitigation	- Sustainable land use	
- Community development	- Water resources management	

Source: UNCTAD, based on the impact objectives as adopted in the Impact Reporting and Investment Standards (IRIS) initiative of the Global Impact Investing Network (GIIN).

The process to do this can include benchmarking and stakeholder dialogue. Benchmarking helps to establish where the country's entrepreneurship development has strengths and weaknesses relative to other countries. The Global Entrepreneurship Monitor,³ for example, provides useful parameters for comparison. It may be particularly useful to take countries as a benchmark that are at a slightly higher level of GDP per capita, because those countries' economic structures may show what can realistically be achieved in the foreseeable future. At the same time, policymakers should treat country comparisons with caution. Each country has a unique history as well as specific initial conditions and preferences that need to be taken into account when formulating a tailor-made strategy. This is why a broad stakeholder dialogue is needed, which builds on benchmarks as a solid information base, but ensures that national strategies reflect countryspecific conditions and preferences (box 3).

c. Ensure coherence of entrepreneurship strategy with other national policies

The effectiveness of entrepreneurship development strategies depends on how (i) the different elements of the strategy are integrated and (ii) how they are aligned with overall development strategies and (iii) with other national competitiveness and private sector development policies. Harmonization with strategic processes pursued by different national ministries and national commissions are crucial to exploit synergies.

The first challenge relates to the internal coherence of the strategy. Its key components (see figure 2) need to be designed and coordinated in a way that reflects the systemic character of entrepreneurship development. If the most binding constraint is not addressed, improvements in other areas may not produce the expected results. As entrepreneurship is a systemic phenomenon, a bottleneck in one area may become a bottleneck for all the other areas. Enterprise can only thrive if the overall environment enables them to obtain all the external inputs that they require—e.g. skills, finance or technological services—at the right time.

The second challenge is to embed the national entrepreneurship strategy in the overall development plans of governments. The targets set in those plans should be reflected in the specific objectives of entrepreneurship development, determining e.g. whether entrepreneurship promotion should be focused on specific economic sectors or groups of society (box 4).

Box 3. Examples of selected policies and initiatives to specify goals and set priorities

Malaysia: In its *Vision 2020,* the Prime Minister of Malaysia identifies entrepreneurship as a key element of economic policy that is necessary to generate economic growth in order to achieve the goals premised on higher income, inclusiveness and sustainability. The 10th Malaysia Plan 2011–2015 provides the strategy to contribute towards these goals. Specific entrepreneurship measures and programmes are identified under two main pillars of the Plan, *Creating an Environment for Unleashing Economic Growth* and *Moving Towards Socio-Economic Development*. Alongside various support measures for the development of SMEs, these include supporting the creation of an entrepreneurial culture and strengthening the entrepreneurial capabilities of the Bumiputera, identified as a priority group in society for economic empowerment.

South Africa: An entrepreneurship strategy can start locally in one city or region and later expand into a national strategy, or foster synergies between federal areas of the country in entrepreneurship. In South Africa, the City of Johannesburg developed a Youth Entrepreneurship Strategy and Policy Framework in 2009 with a vision to contribute to South Africa becoming the leading country in entrepreneurship development in the developing world by 2025. The Strategy is aligned with the Government's priority to tackle very high rates of youth unemployment, and with the activities of the National Youth Development Agency of the Department of Trade and Industry, which offers a range of services to aspiring young entrepreneurs including training, mentorship and access to finance.

Costa Rica: Costa Rica's Government has developed a National Entrepreneurship Policy 2010–2014, an overall strategy for entrepreneurship development. It identifies national priorities that the Government seeks to contribute to through entrepreneurship including the preservation of the environment, intercultural integration and regional brand development. Key areas of action are also identified, taking into account the existing barriers to entrepreneurship. The areas include promoting entrepreneurship, institutional articulation, information and monitoring, financial instruments for entrepreneurs, guidance to entrepreneurs, innovation and technological development for entrepreneurs and encouraging entrepreneurs to export.

Source: UNCTAD Inventory, www.unctad.org/epf

Box 4. Examples of selected policies and initiative to ensure policy coherence with other national policies

Rwanda: The development of an efficient private sector, spearheaded by competitiveness and entrepreneurship is one of the key pillars of Rwanda Vision 2020, which aims to transform Rwanda into a middle income country through pro-poor economic growth. Entrepreneurship is well embedded in the country's Economic Development and Poverty Reduction Strategy 2008–2012 which identifies a lack of entrepreneurship as one of the key challenges for sustainable economic development. The provision of capacity building in entrepreneurship for farmers, the development of innovative credit packages for entrepreneurs and the creation of enterprise units within vocational training centres are among the entrepreneurship measures included in the strategy.

Pakistan: In Pakistan, promoting youth entrepreneurship is seen as key for attaining rapid socio-economic growth, given that the population between 15 and 29 represents over one-fourth of the total population. The National Youth Policy of 2008 includes several measures in support of entrepreneurship development, towards "supporting the youth in establishing self employment businesses and the start of new companies and ventures."

Zambia: Zambia's 6th National Development Plan 2011–2015 has as key objectives to accelerate economic growth and diversification; rural investment; poverty reduction; and human development. Towards these goals, it targets entrepreneurship measures to specific segments of the population, namely: youth, women and rural farmers. It includes entrepreneurship training, as well as measures to improve the infrastructure for the development of rural enterprises.

South Africa: Entrepreneurship policies support the strategy to empower certain disadvantaged groups in society. *South Africa's Broad-Based Black Economic Empowerment Act of 2003*, of the Department of Trade and Industry, aims to increase the economic empowerment of black people in South Africa through strategies including increasing the number of black people that manage, own and control enterprises and productive assets. Specific measures include skill enhancement and facilitating access to finance to aspiring black entrepreneurs.

Mauritius: Entrepreneurship is mainstreamed into the activities of the Ministry of Gender Equality, Child Development and Family Welfare in Mauritius, whose mission includes the economic empowerment of women. The Ministry established a National Women Entrepreneurship Council in 1999 with the objective to increase the technical, organizational and managerial capacity of women entrepreneurs.

Source: UNCTAD Inventory, www.unctad.org/epf

The third and most challenging task is alignment of the entrepreneurship strategy with the broader private sector development agenda. Although all types of entrepreneurial activity and start-ups are valuable for economic development-generating value added, fiscal revenues and employment opportunities, startup companies are particularly valuable for private sector development strategy when they enhance competitive advantages of their home country. Entrepreneurship policy is, therefore, an integral part of the overall national competitiveness policy. This calls for a coherent policy approach that interlocks different areas of private sector development, including industrial policy, investment promotion, trade facilitation, export promotion, SME promotion as well as fiscal policy.

A recent research project on industrial policies in seven developing countries carried out by the German Development Institute⁴ showed that SME policies and programmes for entrepreneurship development are often not sufficiently integrated in the overall strategy for industrial development and competitiveness. In most cases, several Ministries are in charge of different areas of private sector development, such as Trade and Industry, SME Development, and Investment Promotion. As a consequence, important synergetic effects are missed and market segmentation is further aggravated—e.g. when sector strategies of a Ministry of Industry do not address the issue of integrating micro enterprises in value chains, or when investment promotion activities do not reflect the strategic priorities of an overall trade and industrial development strategy.

d. Strengthen the institutional framework

The way entrepreneurship policies are implemented is as important for success as the right choice of instruments.

The first step is to *designate a lead institution* in charge of entrepreneurship development. This can be a working group, ministry or an agency in the government that would be assigned responsibility for all phases necessary to develop a national entrepreneurship development strategy, from defining the overall objectives to implementation and monitoring. Institutional focal points can then be established which could help coordinate the implementation of entrepreneurship policies and facilitate links with other key actors and stakeholders.

Support for new enterprises should be provided in a business-like and customer-focused manner. It is important that service providers understand the problems of starting a business and that their responses are quick. This has implications for the way such agencies are organised, the personnel they recruit and their internal incentive systems.

Entrepreneurship development depends on many interdependent factors that cannot be influenced by one single institution. Therefore, it is important to design joint working arrangements across institutional boundaries. Such a coordinated approach requires that mandates, competences and responsibilities are clearly defined and agreed among all institutional partners. The coordination mechanism can be initiated by establishing a public-private working group or advisory council and can later take the form of a fully institutionalized agency. In most cases it is sensible to build on existing institutions that have proven to be successful in fostering and implementing entrepreneurship initiatives. While the government needs to be part of such a mechanism, it is preferable that the institution, council or working group is not dependent on the political leadership of the moment, so as to ensure sustainability. The formation of publicprivate support networks should also be supported at the sub-national level, as local networks may provide solutions for start-up companies that are tailored to local demand conditions and delivered through more personalized trust-based relationships.

The *private sector* should have voice in, and ownership of, the entrepreneurship development strategy and be actively involved at all levels from policy design to implementation. Business people provide the role models for future entrepreneurs, they have practical experience in developing and implementing business plans, and they know how to overcome practical difficulties. Also, established companies may in future become business partners of start-ups. In practical terms, representatives of private enterprises, business associations, business media, financial institutions, networks of business mentors and the like should be involved in formulating a national strategy. Engaging other stakeholders from academia, NGOs and civil society is also critical (box 5). Non-governmental actors should also be involved in programme implementation. There are multiple actors in the entrepreneurial ecosystem, and it is important for policymakers to differentiate between the policies and actions that need to be public sector-driven and those programmes and actions that would be run more effectively by the private sector or other stakeholders, such as academia and non-governmental organizations. Their expertise and resources can be used, for example, to support advertising activities through business media or coaching of start-ups by experienced business people.

e. Measure results and ensure policy learning

Monitoring and evaluation (M&E) of entrepreneurship programmes is important to ensure that policies remain relevant and that they serve the needs of entrepreneurs at different stages of development. Policymakers are held accountable for the effectiveness of policies, including entrepreneurship programmes, thus they must be able to show to what extent objectives are met.

To allow measurement of progress and results, the national entrepreneurship strategy should have measurable targets and objectives. These can include: (1) basic indicators such as the number of start-ups created (where applicable by sector or target group) and survival rates; (2) more complex economic indicators such as value added, employment generation, or export generation by recent entrepreneurial activity; and (3) sustainable development related indicators such as poverty reduction, women entrepreneurship or start-ups in green-energy sectors (box 6).

In addition to indicators that measure the development outcome of entrepreneurship policies, progress in each of the individual policy areas of the framework (regulation, access to finance, education, etc.) can be measured through more specific indicators. The final section of this document, on "putting the policy framework into practice", contains a list of possible indicators that may be used to define objectives in the national entrepreneurship strategy and to measure results (see table III in Section III).⁵

Periodic evaluations through objective impact studies are helpful to determine the extent to which policy objectives are being achieved. They may use the results of independent surveys carried out by other organizations or research institutes. Governments should ensure that lessons learnt are fed back into entrepreneurship policy making.

Box 5. Examples of selected policies and initiatives to strengthen the institutional framework

Chile: In Chile, where the focus of private sector development policy is on fostering innovative entrepreneurship, entrepreneurship is anchored in the Division of SMEs in the Ministry of Economy, side by side with the Division of Innovation and the Division of Digital Development. Its focus areas include support measures during the different phases of the enterprise; the creation, the development and the closing of a business. CORFO, the Corporation for the Development of Production responsible for the implementation of Government policies in the area of entrepreneurship was set up as an executive organ. Within CORFO, several committees are set up in charge of the management of different entrepreneurship areas. InnovaChile CORFO, for example, manages the area of innovation and technology transfer and executes entrepreneurship initiatives such as Start-up Chile, a programme to attract high growth entrepreneurs to the country.

Barbados: The Barbados Entrepreneurship Foundation formed in 2010, was born from a vision to make Barbados "The #1 Entrepreneurship Hub in the World". Led by a prominent local business leader and a group of local and international entrepreneurs, the goal of the Foundation is to support developing businesses. Its focus is growing sustainable entrepreneurship through finance, government policy, education and skills, mentorship and business facilitation. The Foundation has broad political support.

Botswana: In many countries, the Ministries of Trade and Industry have the mandate to coordinate entrepreneurship policy. This is the case in Botswana, where entrepreneurship development is an integral part of the activities of the Department of Industrial Affairs, within the Ministry of Trade and Industry. The Department is responsible for facilitating industrial development through programmes and strategies aimed at diversifying the economy, creating employment, supporting local industries and stimulating local entrepreneurship.

Singapore: In Singapore, the Ministry of Trade and Industry is also the coordinating entity in charge of entrepreneurship, The Research and Enterprise Division within the Ministry focuses on creating a conducive business environment for Singapore based enterprises to form, compete and grow. It works closely with the Competition Commission of Singapore, the Entrepreneurship Development Agency SPRING Singapore, International Enterprise Singapore and the Agency for Science, Technology and Research as well as various other public and private sector entities.

Malaysia: The Ministry of Works has a division devoted to the development of Bumiputera entrepreneurs in the construction sector. The Bumiputera Development Division has adopted a client charter to efficiently serve and provide guidance to Bumiputera contractors. The charter includes commitments to process applications for specific programmes within 30 days and, to provide feedback to complaints in 3 working days, among other measures.

Source: UNCTAD Inventory, www.unctad.org/epf

Box 6. Examples of selected initiatives and sources to measure results and ensure policy learning

Malaysia: Malaysia's Government continually engages in monitoring and addresses feedback from lessons learnt. For example, through its New Economic Model (NEM), the Malaysian Government addresses the issues that were raised in a recent survey of the entrepreneurial landscape conducted by Warisan Global, a local organization dedicated to advancing entrepreneurship. The NEM proposes streamlining programmes and initiatives to foster entrepreneurship and education and skills development have been made a priority. Funding initiatives have also been restructured to enhance financial support while reducing "dependent mentality".

Global: The OECD's Entrepreneurship Indicators Programme (EIP) is a tool that developing countries can look to for international benchmarking and can be used as a guideline when developing their own indicators. The EIP aims to address the information gap that exists with regards to measuring entrepreneurship and build internationally comparable statistics on the determinants of entrepreneurship, entrepreneurial performance and the impact of entrepreneurship.

Global: The Global Entrepreneurship Monitor (GEM) is a worldwide study on entrepreneurship. Its global and national reports include international benchmarking, local context and entrepreneurship policy recommendations. GEM has conducted interviews with individuals in over 85 countries since 1999 and has produced a series of indicators which address entrepreneurship activity, attitudes and aspirations.

Global: The World Bank Group Entrepreneurship Snapshots, a joint effort by the World Bank Development Research Group, the International Finance Corporation (IFC), and the Kauffman Foundation is a comprehensive dataset on enterprises. It provides an indicator of business creation around the world and facilitates the investigation of the factors that foster dynamic private sector growth. It measures entrepreneurial activity in 115 countries over the six year period 2004–2009. The data also offer a snapshot of the impact of the 2008–2009 financial crisis on entrepreneurial activity.

Source: UNCTAD Inventory, www.unctad.org/epf

1.3. Formulating National Entrepreneurship Strategy: A checklist of key questions

- Are there surveys for assessing the national entrepreneurial environment?
- Do mechanisms, such as multi-stakeholder fora, exist to promote policy dialogue on entrepreneurship?
- Does the country have a dedicated policy framework to promote entrepreneurship? Is there a national entrepreneurship strategy?
- Is there clarity about the priorities and types of entrepreneurship that the country wants to encourage?
- Are there specific policies in place to favour start-ups and SMEs?
- Are there specific policies in place to encourage the transition to the formal business sector?
- Is the entrepreneurship policy closely coordinated with other national policies? Is entrepreneurship embedded into other national policies?
- Is there a ministry, agency or institution championing entrepreneurship? Is there a ministerial level entity in charge of coordination of the strategy?
- Is there a deliberate policy to promote formal entrepreneurial activity among specific groups of the population?
- Are there specific targets or measurable objectives to increase entrepreneurial activity?
- Does the government assess the impact of policy measures?
- Does the government support regular independent policy evaluations?
- Does the government incorporate feedback from lessons learnt?
- Is there an annual (periodic) report on the state of entrepreneurship?

2. Optimizing the Regulatory Environment

2.1. Introduction

The unleashing of entrepreneurship requires an environment that enables the entrepreneur to create, operate, manage, and if necessary, close a business within a context where compliance with the rule of law governing disclosure, licensing and registration procedures, and the protection of physical and intellectual property is guaranteed. The regulatory environment should encourage people to set up their own business, to try new business ideas and to take on calculated risks, keeping administrative burdens to the minimum required to support public policy and sustainable development objectives. Table II.2 provides a synopsis.

A number of well known policy guides exist to analyze and compare the business climate of countries and to inform policymakers about reform needs and options. These include the World Bank's "Doing Business" Report and Governance Indicators, the World Competitiveness Report, the Index of Economic Freedom, and the Bertelsmann Transformation Index, among others. The Global Entrepreneurship Monitor provides more specific guidelines for entrepreneurship policies, and the Donor Committee for Enterprise Development has published guidelines for development agencies that support business environment reforms.⁶ Many of the policy areas addressed in these reports are crucial for enterprise development; for example, labour market policies designed to protect worker's rights in large enterprises may turn out to be too rigid for start-ups; the ideal level of taxation and enforcement are also difficult to identify. Analyzing the effects of all these policies on entrepreneurship is beyond the scope of this document. The UNCTAD Entrepreneurship Policy Framework focuses on a limited set of regulatory issues that have the greatest immediate relevance for start-up activities.

Rules and regulations are not designed nor intended to act as a burden to entrepreneurs. Entrepreneurship

TABLE II.2. OPTIMIZING THE REGULATORY ENVIRONMENT			
POLICY OBJECTIVES	POLICY OPTIONS		
a. Examine regulatory requirements for start-ups	 Benchmark time and cost of starting a business Benchmark sector- and region-specific regulations Set up public-private dialogue on regulatory costs and benefits Balance regulation and standards with sustainable development objectives 		
b. Minimize regulatory hurdles for business start-ups where appropriate	 Review and, where appropriate, reduce regulatory requirements (e.g. licenses, procedures, administrative fees) Introduce transparent information and fast-track mechanisms and one-stop-shops to bundle procedures Enhance ICT-based procedures for business registration and reporting 		
c. Build entrepreneurs' confidence in the regulatory environment	 Ensure good governance Make contract enforcement easier and faster Establish alternative conflict resolution mechanisms Guarantee property protection Reduce the bankruptcy stigma and facilitate re-starts 		
d. Guide entrepreneurs through the start-up administrative process and enhance the benefits of formalization	 Carry out information campaigns on regulatory requirements Make explicit the link between regulatory requirements and public services, including business support services Assist start-ups in meeting regulatory requirements 		

Source: UNCTAD.

development *requires* rules and regulations. Some rules and regulations are necessary to ensure standards that society as a whole deems necessary, such as inclusive and sustainable development. When entrepreneurs want to set up a new firm, this firm has to adhere to the same health, security, environmental, or employment standard as any other company. Clear national standards for labelling and certification are also needed in order to promote specific goals.

Furthermore, rules, standards and regulations are needed to enable the development of a thriving business community. When firms engage in business transactions with other firms, they need to be sure that contracts are enforceable, which implies that business partners are registered as legal entities. In the same vein, a competition policy needs to be in place to ensure that entrepreneurs have an opportunity to compete in the market place, or that they are protected from abuse of dominant positions of incumbent companies. Finally, rules are also needed to protect the physical and the intellectual property of firms.

However, imposing a heavy regulatory burden on the private sector can be very harmful to entrepreneurship development. The Doing Business rankings show that some of the most entrepreneurial and competitive economies (such as Singapore, New Zealand and Canada) impose the least administrative requirements on start-ups. Countries that impose more onerous administrative requirements on firms and where the cost of registration is higher typically show much lower rates of entrepreneurial activity. In poorer countries, the negative consequences of excessive administrative requirements and higher registration costs are often even more significant, as they weigh heavier on the capacity and resources of local entrepreneurs.

Excessive administrative barriers or lack of transparency about the requirements entrepreneurs have to fulfil can have significant adverse effects not only for the start-up company—which has to bear costly and time-consuming procedures—but also for society as a whole. When starting a business is discouraged, the business models of incumbent firms are not regularly challenged, enabling inefficient producers to maintain their market position. The economy's overall productivity increases more slowly than it would in an economy that fosters easier firm entry and competition.

Also, administrative entry barriers affect poor people in particular. The cost of business registration and licensing,

for example, may be a negligible investment for a wealthy entrepreneur who expects to make substantial profits, but it may be a heavy financial burden for a poor micro entrepreneur. High costs prompt many of the latter to remain informal, which excludes them from contractual relationships with banks and other business partners and restrains their growth. Overregulation is thus both inefficient and unfair.

2.2. Policy objectives and policy options

a. Examine regulatory requirements for start-ups

The first step in establishing a regulatory environment conducive to business is to understand the extent to which existing rules and procedures may hold back entrepreneurial activity. This implies distinguishing between regulations that are essential for the functioning of businesses; those that are essential, but can be simplified or otherwise managed in a more efficient way; and those that produce more costs than benefits and should be abolished.

Making this distinction can best be achieved in three steps. The first step is *benchmarking the national business climate* against other countries. Countries can draw on numerous systems of indicators that are published on an annual basis. It should be noted that these indicators make different underlying assumptions about what a "good" business climate is, and therefore arrive at different rankings. The indicators should also be interpreted with caution as reported figures may be based on the legal requirements for standard business operations (in the case of Doing Business Indicators) or on the perceptions of a limited number of business people (e.g. in the case of the Global Competitiveness Indicators) and may not be representative of the views of the whole business community.

Policymakers should also bear in mind that the least regulated environment need not be the most efficient one, as some of the rankings suggest. As stated above, entrepreneurs *need* appropriate regulation to ensure predictability of the business environment, fair competition, and security. Also, national entrepreneurship strategies aiming to facilitate the development of activity in specific target areas, or for specific target groups, *need* appropriate regulation for their successful implementation.

Nevertheless, where a country ranks on these indicators provides a valuable indication of how complex the national regulatory framework is compared to other countries, and which specific areas (e.g. registering a business or trading across borders) may be over-regulated. Those countries with aboveaverage regulatory requirements may wish to explore the scope for cutting unnecessary regulations. With regard to the number of procedures, the time and cost involved in starting a new business, for example, the differences between countries are very substantial.

The second step is to *look at specific sectors and regions* and assess whether specific licensing or administrative requirements are justified or not. Again, benchmarking such requirements against international experiences, or between regions or sectors, may provide valuable information.

Benchmarks are not only a source of information for decision-makers interested in understanding where a country stands in comparison to others; usually, the data are taken up by the media and the business community who use them to press for reforms. Public awareness and lobbying on the basis of such data has been a major driver of reform. The Doing Business Reports document hundreds of changes across the world to reduce the administrative cost of doing business. To encourage this process, the reports regularly highlight the top reformers.

Despite these benefits, rankings alone tell little about optimal levels of regulation, because country conditions vary considerably and societies and governments have different preferences with regard to regulations. For example, what exactly is considered to be anti-competitive behaviour, or whether artisanal producers should be protected from large-scale manufacturers, depends on social norms and values; and these often vary considerably from country to country. Each country therefore needs to define its own set of business regulations.

This is why benchmarking exercises need to be complemented with a third step: the *organization of a public-private dialogue* on the costs and benefits of regulations. Such a dialogue is important to convey the business communities' concerns about excessive regulations and increase the regulators' awareness about the costs of regulation. Conversely, the public sector may convince the business community that certain regulations are needed. This way, publicprivate commissions can incrementally develop a shared understanding and step-by-step weed out unnecessary regulations and improve the remaining ones. Business associations have a key role in this process but it is also important to involve other stakeholders, such as workers' unions or consumer associations (box 7).

b. Minimize regulatory hurdles for business startups

Many developing countries continue to work to reduce or eliminate obstacles to business including bureaucratic procedures and transparency issues such as lack of accurate information, or costly and time-consuming customs procedures. Still, institutional inefficiency and overlapping institutional involvement in administrative procedures coupled with deficient interdepartmental coordination often result in delays and unnecessary financial requirements in obtaining business licenses. In many developing countries, it takes up to six public institutions involved in the process four months to legalize economic activities.⁷ These obstacles impose tremendous costs on entrepreneurs and prejudice the environment for doing business in a country.

Burdensome regulation also encourages corruption. Faced with requirements of going through various procedures in different offices, entrepreneurs may end up using illicit methods to accelerate the process. In developing countries the costs of "smoothing the process" to start a business or to get a license for an investment project are often much higher than the official registration fee. This unofficial and invisible cost is commonly considered unavoidable by the business community. Time and money are, therefore, allocated to unproductive lobbying. Small-scale entrepreneurs often suffer most from a heavy regulatory burden and its derivative—corruption.

In many developing countries a significant part of the economy remains in the informal sector, the size of which is crucially determined by the quality of the legal framework, more precisely company entry costs and regulatory burden, including corruption and financial constraints. Breaking down these hurdles thus promotes and facilitates formal entrepreneurship.

Often, procedures for start-ups can be abolished without any negative side effects. Three measures have shown to be particularly successful in this regard: (a) systematic procedures to review and cut business start-up requirements in terms of number of licenses, procedures, and administrative fees; (b) the introduction of fast-track mechanisms and one-stopshops to bundle procedures; and (c) the introduction

Box 7. Examples of selected policies and initiatives to examine regulatory requirements for start-ups

Kenya: In Kenya, the Business Regulatory Reform Unit was established in 2006 with the mandate to permanently keep track of all regulatory regimes and licensing in Kenya and ensure that new regulations, licenses, fees and charges do not create unnecessary burdens on business and meet international best. Among its key activities, the Unit has implemented the supervision and screening of the quality of new licensing regulations through a Regulatory Impact Assessment (RIA) —a systematic process to assess the possible impacts of intended regulation.

Bangladesh: The Bangladesh Better Business Forum was established in 2007 in response to low business confidence, regulatory uncertainty, bureaucratic bottlenecks and barriers to businesses. With 41 members (20 public and 21 private) and chaired by the Prime Minister, the Forum has five working groups, including one on business entry and operations. To date, the Forum has organized more than 50 working sessions, proposed 249 recommendations of which 113 were approved. Among the results achieved, businesses benefit from company name clearance in 3 days, registration in 14 days, trade license in 3 days, and environmental clearance certificate in 30 days.

Global: The World Bank's Foreign Investment Advisory Service developed a methodology for measuring production time and costs at different stages of specific production processes, which can then be compared across countries. The methodology can be used to establish, for example, how much registration costs, labour costs, or energy costs contribute to the total production cost of a standard product, such as a T-Shirt. This provides more accurate sector-level information about the real cost of certain government policies. Such data may be particularly valuable if compared with international competitors at similar income levels.

Some countries, including **Indonesia** and **Viet Nam**, have set up similar benchmarks within their boundaries, comparing the ease of doing business between administrative regions. These internal benchmarks have the advantage that they compare regulatory requirements within the same national environment, where socio-economic conditions tend to be fairly similar. Also, political competition among provinces can be even tougher than between states. In fact, national media are often "naming and shaming" the poor performers, which has proven to be a strong driver of political reform.

Source: UNCTAD Inventory, www.unctad.org/epf

of ICT-based procedures for business registration and reporting.

The process of administrative simplification begins with the identification of procedural steps that are necessary to achieve regulatory objectives. It should adopt the point of view of users to eliminate hurdles, to reduce delay and to group requirements. Many countries have unified forms and standardized incorporation documents. Others have eliminated the registration of the company seal, the publication in legal journals of a company establishment, or minimum capital requirements. Among property registration procedures, some countries have removed the notarization requirement and physical inspections to assess the value of the property. One-stop-shop, which can be physical or virtual, ensures that entrepreneurs do not have to go to multiple government agencies. For example, online registration procedures, where feasible, are one of the most effective ways to speed up a company registration. Electronic systems are also a good way to share information among agencies, offering an integrated and cost-effective service to the users. On-line, entrepreneurs can easily access documents and obtain certificates, if appropriate regulations are in place for the use and acceptance of electronic signatures. Regular feedback from users should help further simplifying procedures (box 8).

c. Build entrepreneurs' confidence in the regulatory environment

A sound regulatory framework is one that operates based on predictability and transparency, as well as proper enforcement mechanisms. It is essential to emphasize the importance of the quality of regulatory enforcement, which remains a challenge for a number of national regulators.

There are several aspects that affect the efficiency of regulation enforcement and compliance: the first is related to the regulator's power to enforce rules. Differences in market and regulatory maturity, as well as legal and judicial practices, influence the enforcement practices and procedures of individual countries. Compliance can be improved by training government officers both at the national and local levels, especially those who deal directly with starting entrepreneurs, accompanied by a sufficiently strong

Box 8. Examples of selected policies and initiatives to minimize regulatory hurdles

Albania: In 2006, Albania started a programme called "Millennium Challenge Corporation Threshold Programme" aiming at improving the environment for business. The impact was impressive: 60% of licenses have been abolished; the time required to register a business was reduced from 28 days to only one day with one-stop business registration. Applicants have to go through only 5 administrative procedures, compared to 10 steps in the past. Ministries must give a license within 30 days, compared to 140 days before.

Burkina Faso: The Government of Burkina Faso adopted in 2008 an action plan that aimed at simplifying procedures for registering a land title and reduce associated delays and costs. Since its introduction, the process of transferring property has also been shortened, taking 21 days in 2010 instead of 182 days in 2008, using five procedures instead of eight and costing 50% less for residential land (\$3,677 instead of \$7,354) and 64% less for industrial land (\$8,812 instead of \$24,477).

Former Yugoslav Republic of Macedonia: In January 2006, the former Yugoslav Republic of Macedonia introduced a one-stop-shop system that enables investors to register their businesses within 4 hours. Entrepreneurs can register a company in the country by visiting one office, obtaining the information from a single place, and addressing one government employee. The one-stop-shop system operates within the Central Register via 32 electronically integrated offices located throughout the country. The new registration procedure is simpler, decentralized and client oriented.

Indonesia: In 2006, as part of the national investment climate reform strategy, with support from international donors, the Government of Indonesia introduced the One Stop Shop (OSS) service centres for business registration and licensing. The OSS simplifies the licensing process so that enterprises no longer need to visit several different local agencies to obtain permits, and integrates the authority to issue licenses, commonly located in various disparate government offices, into one government department. The introduction of the OSS has reduced the time for business registration and trading permits from more than 20-30 days to 10 days; the cost has been reduced by nearly half.

Republic of Korea: In February 2010, the Government made starting a business easier and less costly through an online system, Start-Biz Online, which is managed by the Small & Medium Business Administration. In the past, entrepreneurs starting a company had to manually fill out more than 30 forms and visit 6 different agencies which led 96% of company founders to hire a lawyer as their agent. Now they enter information once, and the online system automatically distributes it. Entrepreneurs can use the system to conduct name searches, register a company, pay local taxes and corporate registration tax, and more.

Source: UNCTAD Inventory, www.unctad.org/epf

and transparent system to carry out enforcement activities, and by dealing with complaints of noncompliance and conducting investigations on suspected violations. The second main element is related to entrepreneurs' awareness. Working closely with business associations to update regulatory information, educate entrepreneurs and guide them on how to comply with laws and regulations is essential to improve compliance.

Government departments should operate, based on the same principles of performance and compliance, and deliver services in a timely and efficient manner. They must ensure that procedures are applied in a uniform manner, in order to avoid the appearance of corrupt behaviour, favouritism and nepotism. Based on key principles of good governance,⁸ governments should operate in a participatory, transparent and accountable manner, making sure that authorities uphold high standards of conduct and behaviour, and developing the capacity and capability of government officials to be effective.

Small and large businesses alike, as well as foreign investors, require certainty that contractual engagements will be respected and fulfilled. In addition, they need assurance that where a breach of contract occurs, legal measures are in place to either assure the enforcement of the contract or provide adequate compensation for losses incurred. In a legal system where uncertainty in contract enforcement exists, and where it is very costly to pursue a case in court, entrepreneurs are discouraged from formalizing business transactions.

Governments can also establish alternative mechanisms to settle legal disputes without going to court. Alternative *Dispute Resolution Systems* may result in faster settlement of claims, reduced legal fees and ultimately improve security for investors. For that purpose, arbitrators need to be trained and

the system needs to be established in the business community. Crucial is the recognition and execution of arbitral decisions. The execution must be ensured by the court and supported by the judicial system in order to insure the effectiveness of alternative dispute settlement mechanisms.

Property rights (including intellectual property rights) are fundamental for doing business and require appropriate protection. However, protection comes through formalization, or registration. In many developing countries, registration of property remains time consuming or prohibitively expensive. This represents a major impediment to doing business as it eliminates an important form of security for the business owner or investor. Policies that guarantee property rights and improve the enforceability of

contracts are essential to create investor confidence and can make a country an attractive location for investment (box 9).

Confidence in entrepreneurship can also be strengthened by reducing the *bankruptcy stigma and facilitating re-starts*. In many societies, entrepreneurs who have failed once are unlikely to get credit again. However, societies that understand the experimental character of entrepreneurship and the risks involved, and that support second and third chances tend to fare better in terms of enterprise development.

This has two main consequences for policy: first, people working in the field of entrepreneurship development from bankers to trainers of entrepreneurship courses to representatives of business associations or SME

Box 9. Examples of selected policies and initiatives to build confidence in the regulatory environment

Mali: Mali's Alternative Dispute Resolution project commenced in 2008 and was completed in 2011. Eleven new arbitration cases have been received by *Centre de Conciliation et d'Arbitrage du Mali* since the project's inception, compared to just 2 cases received between 2005 and 2008, a significant indicator of increased confidence in its capabilities. Compared to regular courts the number of days to enforce a contract is reduced from 860 to 180 days, the length of time taken to file judgments from 345 to 180 days and judgments are enforced in 30 days as opposed to 515 days. Specialized training was given to a total of 120 magistrates and arbitrators. New arbitration regulations have been established and awareness of arbitration as a dispute resolution mechanism within the business community has improved.

Central Asia: The programme "Supporting Legal and Judicial Reform in Central Asia" has helped improve institutional capabilities in *Kazakhstan, Kyrgyz Republic, Tajikistan, Turkmenistan and Uzbekistan* since 2002. More than 40 training sessions have been held for over 1,800 participating judges, legal practitioners and lawyers in the Kyrgyz Republic since 2007. In Kazakhstan, around 800 judges have been trained since 2004. So far in 2010, 336 judges and 100 lawyers have gained further qualifications in Tajikistan. In Uzbekistan, cooperation has just started with the Supreme Court concerning the education of judges. Lastly, in Turkmenistan judges and lawyers are being trained together; there were 100 participants in 2010.

Zambia: In 2011, Zambia improved contract enforcement by introducing a system in the courts that provides electronic referencing of cases, a database of laws, real-time court reporting and public access to court records. Additional judges were appointed and as many as 10 judges were trained in commercial law to improve the quality of judgements and cut the backlog of cases awaiting hearings. The standard of the court process is being strengthened further through a programme of education, including training on computer literacy and the court case management system for both judiciary staff and lawyers.

Latvia: A new insolvency law has come into force in November 2010. The new law aims to improve the legal environment of the insolvency process, and as a result insolvency processes for individuals and legal persons have been simplified. The law also made it possible for financially distressed companies to continue operating while pursuing reorganization. Insolvency administrators have formed an association providing advice to distressed firms. The reform also tightened the qualification standards for bankruptcy administrators.

Fiji: Before implementing the amended Foreign Investment Act, the Ministry of Commerce, Business Development and Investment held a series of public seminars, targeted at private sector organizations, to raise awareness about the revised FIA and the Cabinet's directive for reform to the investment approvals process. Attendance at the Regulatory Reform Task Force meetings has been good, with the private sector contributing their first-hand experiences and suggesting improvements to Fiji's investment climate. This generated much interest from existing local and foreign investors and intermediaries.

Source: UNCTAD Inventory, www.unctad.org/epf

development agencies-should have a positive attitude towards entrepreneurial experimentation, and incentives in their institutions should be adapted accordingly. Second, bankruptcy laws should be designed to help viable companies in distress and make closing and restarting easier. Companies need insolvency procedures which recognize that viable businesses can suffer from temporary problems, e.g. due to an economy-wide recession. Such procedures should facilitate the necessary internal reorganization and the restructuring of debts. A key objective of bankruptcy laws should be to help viable companies survive while safeguarding the interests of creditors. This requires being able to distinguish quickly and at low cost between firms to restructure and firms to close

d. Guide entrepreneurs through the start-up administrative process

The complexity of many aspects of business regulation makes it important to put in place effective mechanisms to help entrepreneurs through administrative procedures for starting their business. This may be particularly important for certain groups of entrepreneurs, and it is generally important for startups, because new entrepreneurs are not familiar with common processes and often have to go through many initial administrative procedures for registering their business, obtaining licenses and authorizations, exactly at the time when they are struggling to build their new business.

One of the initiatives that have proven very successful in developing countries is the systemization and display of information on regulations and administrative procedures for starting a business on a relevant government entity's website or at the business registration agency (see box 10). Usually, aspiring entrepreneurs do not pay much attention to regulatory requirements until they have a clear business idea and have decided to become an entrepreneur. At that point, if the first barrier to set up a formalized business is overcome thanks to clear and detailed instructions given either by special government officers or by an online or automated system, new entrepreneurs will be more motivated and encouraged to implement their business project. Permanent and efficient help desks at competent entities, ready to answer questions and counsel on any administrative requirements to start up a business can also be of great help.

In addition, it is important that the business community sees the advantages of regulations and receives benefits from them. They expect that regulations are enforced across board so that they operate on a level playing field. Good public services are a necessary complement of regulatory reforms. Governments, and particularly those agencies dealing with start-up companies, should therefore carefully consider what they are giving back to entrepreneurs in return for

Box 10. UNCTAD's e-regulations tool

The e-regulations system, initiated and launched by UNCTAD in 2007, is a web-based e-Government system to help developing countries and countries in transition to work towards business facilitation through transparency, simplification and automation of rules and procedures relating to enterprise creation and operation. It allows governments to present procedures online in a detailed and precise way and to make administrative procedures transparent, swift and efficient.

Procedures, e.g. for business start-ups, are detailed step by step from the user's perspective. For each step, the system shows what is expected at the end of the step, who are the civil servants in charge, what are the forms and other documents required, the costs involved (if any), processing time, legal justification of the step and ways to file complaints or recourse in case of disagreement. The information is certified by the entities in charge of each step.

The implementation process of the e-regulations tool has two phases. The first phase is a demonstration phase, in which information on the process to register a company, acquire real estate or other administrative issue is collected, organized, verified and presented online. During that phase, UNCTAD consultants, in close co-operation with local counterparts, undertake all activities. The second phase builds the capacity for local governments to administer the system autonomously, update and expand the information, proactively promote it among international and local businesses and use the system as a tool for the simplification of procedures. The e-regulations system is implemented by UNCTAD in countries upon request. Since its inception, the programme has helped prepare such step-by-step guides in 12 countries and one city (Benin, Burkina Faso, Cape Verde, Cameroon, Colombia, Comoros, Costa Rica, Guatemala, Mali, Nicaragua, Viet Nam, Rwanda and Moscow).

For more information, see: www.eregulations.org

their administrative requirements and taxes. Making public services more customer-oriented and efficient, and holding public agencies accountable, are key elements of a coherent national entrepreneurship development strategy. Whenever possible, the link between regulatory requirements and services should be made explicit. For example, when governments collect a fee from sales booths, entrepreneurs should be able to see the benefits in terms of water supply or garbage collection services (box 11).

Box 11. Examples of selected policies and initiatives to assist entrepreneurs in the start-up phase

Kazakhstan: The Atyrau Business Advisory Center was established in Kazakhstan in 1999 to provide drop-in services, seminars, training and workshops to help entrepreneurs start and develop their businesses. So far the Atyrau Business Advisory Center has counselled hundreds of local firms and helped to create some 300 business plans, over a quarter of which have been implemented. More than \$2 million in loans has been disbursed, generating over 530 new jobs. Among the new businesses started are a private ambulance service, bowling alley and the city's first supermarket.

Viet Nam: Ho Chi Minh City has launched and maintained a website under the Department of Planning and Investment, which provides detailed guidance on regulatory requirements to set up a business and comply with regulations during the life of the company and a business registration online shop where entrepreneurs can deal with start-up procedures. The step by step guidance includes a categorized and updated list of all start-up regulations, accompanied by forms to download and submit, an interactive blog between government officers and entrepreneurs with current questions and answers not older than two days. The online business registration was introduced as an alternative for entrepreneurs to a paper application.

Global: The Lex Mundi Pro Bono Foundation (www.lexmundiprobono.org) is affiliated with Lex Mundi, an association of independent law firms. It has a commercial law firm in many countries and more than 500 offices. The Foundation works with the law firms and lawyers in the Lex Mundi network to help provide *pro bono* legal assistance to social entrepreneurs.

Source: UNCTAD Inventory, www.unctad.org/epf

2.3. Optimizing the Regulatory Environment: A checklist of key questions

- Has the government carried out an assessment of the process of starting a business? Does it benchmark the time and cost of starting a business? Does it have a good overview of sector- and region-specific regulations?
- Is a public-private dialogue on regulatory costs and benefits in place?
- Has the government considered initiating a process of weeding out unnecessary regulations?
- Are there special provisions for social entrepreneurship?
- Does the country have fast-track mechanisms and one-stop-shops to bundle procedures? Does it make use of ICT-based administrative procedures?
- Does the government offer mechanisms to make contract enforcement easier and faster?
- Has it considered the introduction of alternative dispute resolution mechanisms?
- Do bankruptcy laws allow for business re-starts?
- Does the government offer services to assist start-ups in meeting regulatory requirements?
- Is information about business establishment procedures transparent? Are business regulations available online? Are there tutorials available for start-ups? Is information on business regulations also made available to disadvantaged groups?

3. Enhancing Entrepreneurship Education and Skills Development

3.1. Introduction

Entrepreneurial skills centre around *attitudes* (soft skills), such as persistence, networking and selfconfidence on the one hand and *enabling* skills (hard skills) on the other hand, including basic start- up knowledge, business planning, financial literacy and managerial skills. Effective entrepreneurship education policies and programmes focus on developing these entrepreneurial competencies and skills, which are transferable and beneficial in many work contexts. The aim is not only to strengthen the capacity and desire of more individuals to start their own enterprises, but also to develop an entrepreneurial culture in society. Table II.3 provides a synopsis. Entrepreneurship education is usually not an explicit part of the curriculum of educational institutions at any level in most countries. Instead, hard and soft entrepreneurship skills are taught as part of basic subjects, or through teaching methods. Thus, government policies on entrepreneurship can ensure that entrepreneurship is embedded into the formal educational system as well as offered as a formal subject through community, rural and apprentice training programmes. Mainstreaming entrepreneurship into the national education curriculum can be coordinated by the Ministry of Education, often with the involvement of other ministries, such as the Ministry of Culture, Industry/Enterprise, Research, Science and Technology, among others. In addition, the engagement of other stakeholders is valuable. Business, NGOs. foundations. international organizations, government agencies and other stakeholders have important roles to play and need to be engaged in the process of developing and

TABLE II.3. ENHANCING ENTREPRENEURSHIP EDUCATION AND SKILLS DEVELOPMENT		
POLICY OBJECTIVES	POLICY OPTIONS	
a. Embed entrepreneurship in formal and informal education	 Mainstream the development of entrepreneurship awareness and entrepreneurial behaviours starting from primary school level (e.g., risk taking, teamwork behaviours, etc.) Promote entrepreneurship through electives, extra curricular activities, career awareness seminars and visits to businesses at secondary school level Support entrepreneurship courses, programmes and chairs at higher education institutions and universities Promote vocational training and apprenticeship programmes Promote and link up with entrepreneurship training centres 	
b. Develop effective entrepreneurship curricula	 Prepare basic entrepreneurial skills education material Encourage tailored local material, case studies and role models Foster interactive and on-line tools Promote experiential and learning- by- doing methodologies 	
c. Train teachers	 Ensure teachers engage with the private sector and with entrepreneurs and support initiatives that bring entrepreneurs to educational establishments Encourage entrepreneurship training for teachers Promote entrepreneurship educators' networks 	
d. Partner with the private sector	 Encourage private sector sponsorship for entrepreneurship training and skill development Link up business with entrepreneurship education networks Develop mentoring programmes 	

Source: UNCTAD.

implementing entrepreneurship education policies. Regional and local authorities also play an essential role in promoting entrepreneurship education in the local community. Finally, for future policy action in this area, it is important that precise, comprehensive and objective quantitative data are developed to monitor progress.

3.2. Policy objectives and policy options

a. Embed entrepreneurship in formal and informal education systems

Perceptions and attitudes about entrepreneurship start at a young age. In developing countries, enrolment rates after primary education may decrease rapidly, and, therefore, entrepreneurship education should be considered a priority at early levels. Entrepreneurship education at the primary school level focuses mainly on soft skills, including entrepreneurship awareness and the development of entrepreneurial behaviours (e.g. risk taking, teamwork skills, opportunity seeking). There is no single technical course on entrepreneurship at such a young age. The adoption of awareness programmes with interactive games and, where feasible, online tools have proven particularly useful in many countries (box 12).

At secondary level, students need to be informed about self-employment as part of career development and mentored about their choices. Students also need to learn basic business skills, such as economics, marketing and rudimentary local commercial law. The implementation of extra-curricular activities, including visits to businesses to understand the world of work has yielded good results in some countries.

Box 12. Examples of selected policies and initiatives in entrepreneurship education

Global: Junior Achievement, an NGO, is the world's largest organization dedicated to educating young students about workforce readiness, entrepreneurship and financial literacy through an experiential, hands-on programme At the elementary level, school programmes have six sequential themes, each with five hands-on activities as well as an after-school and capstone experience which help students understand business and economics.

Global: In collaboration with the Kauffman Foundation, Disney's Hot Shot Business online game teaches young people about the excitement and opportunity of entrepreneurship. This game teaches children 9–14. It reaches more than 20 million young people a year.

Brazil: The Desafío SEBRAE (the SEBRAE Challenge) is a programme of the governmental agency for SME development. It is an online virtual business game which simulates the day-to-day business operations and allows university students from across the country to test their management skills, ability to make decisions and to work in a team. In 2011, more than 140,000 students registered for the challenge.

India: The National Institute for Small Industries Extension Training (NISIET) is a training institution in India that has developed an integrated model for entrepreneurship development. It pioneered trainers' training programmes to develop trainers in local areas. NISIET has developed specific training programmes for educated unemployed youth, technicians, rural youth, women, and artisans.

Middle East & North Africa: INJAZ is an important example of an education programme in the Arab world that teaches students business, entrepreneurship, and life skills as part of a regular school curriculum. Its educational programmes have reached more than 300,000 students and engaged 10,000 volunteers across the region.

Kenya: Entrepreneurship education has been a compulsory and examinable subject at all levels of technical and vocational schools since the early 1990s. The objectives of the curricula are (a) to develop entrepreneurial attitudes in students and (b) to equip the students with relevant knowledge and skills for starting and running their own businesses. The content is partly motivational and partly pragmatic, focusing on practical issues like business laws, existing credit systems, bookkeeping, and marketing.

Global: Students in Free Enterprise (SIFE) is a global network of business executives, academic leaders and university students devoted to creating economic opportunities. SIFE promotes entrepreneurial skills in student teams who develop business projects that serve economic needs within local communities around the world. SIFE operates in 40 countries and is supported by executives from large corporations who act as advisors to student teams and as judges in the annual national and global SIFE competitions in which students present their business projects.

Source: UNCTAD Inventory, www.unctad.org/epf

Student-led initiatives are also useful to initiate special projects to establish links with local communities, serving their needs.

At the higher education level, attending elective and/ or required courses on entrepreneurship, as well as participating in more focused activities and projects, has proven effective. It is important that students are exposed to entrepreneurship prior to their specialization, if they go on to university.

Vocational schools offer the largest variety of specialized programmes in such trades as carpentry, electronics, cosmetology, auto-mechanics, building trades, welding, computer-automated design and manufacturing (CAD/CAM), and many other technical and apprentice-type occupations. In addition, there are also cases in which such training institutions identify companies' demand for skills and define courses based on those demands. In some variants oriented towards self-employment, internships in companies are replaced by supervised implementation of an independent productive project with coaching provided by a mentor. With the introduction of entrepreneurship teaching in vocational schools, young people can learn how to enter self-employment, subcontracting, and small business in all these fields.

At the university level, entrepreneurship centres can play a key role in promoting entrepreneurship both within and outside of the curriculum. These centres provide a dedicated space where ideas can be incubated and start-ups supported by experts available through the university's network of mentors. Entrepreneurship education should be encouraged across different university disciplines. It should not be limited to business majors or students in specialized science, engineering and technology programmes.

Beyond embedding entrepreneurship education at the different levels of the formal education system, supplementary programmes are useful in order to target specific segments of the population, including youth, women, rural populations and other potentially underserved groups. These might include after school programmes or activities in community centres.

b. Develop effective entrepreneurship curricula

While entrepreneurship could be taught as a standalone, independent course of study, this is not the only approach, or necessarily the most effective. Even if a freestanding course is provided in the curriculum, its effectiveness will be enhanced if entrepreneurial insights and competencies are developed throughout the curriculum. If entrepreneurship education is isolated in a single course, separate from the rest of the curriculum, it may be missed by many students.

In developing countries, some of the priority areas which may be included in entrepreneurship curricula, depending on the educational level, are basic financial skills, opportunity recognition, business planning, small firm management and rudimentary commercial law. Themes that could be addressed include the transition from necessity to growth firms and generational change in the business, particularly family-owned. The younger the target audience, the more the curriculum needs to be focused on the development of soft skills such as entrepreneurial behaviours. Overall, entrepreneurship education should encompass the following:

- The development of personal competencies including: working in a team, self-confidence, self-awareness, calculated risk taking, problem solving, creativity, thinking as employers rather than as employees and dealing with uncertainty in an enterprising way (see box 13).
- The acquisition of core operative skills: numeracy, accounting, communication, ICT and rudimentary knowledge of local commercial law and governance principles. They represent the fundamentals for operating effectively in a working environment, and also help improve personal and family budgets and management.
- Business & management skills: competitive advantage analysis, market research, business plan development, marketing, financial management, sales and human resources. Curricula should include case studies and exercises in setting up and running a company and should develop the knowhow to identify and exploit business opportunities for solving social and/or environmental issues. Financial and human resource management skills that are necessary for the formation and survival of a new enterprise should also be introduced.

Effective entrepreneurship curricula introduce experiential learning through interactive teaching methods that incorporate practical experience and encourage learning-by-doing. Further, entrepreneurship curricula should be tailored to the local environment and leverage existing resources as well as create new local

Box 13. UNCTAD-Empretec Entrepreneurship Training Programme

Empretec is an integrated capacity building programme of UNCTAD that is currently operating in 32 countries across the developing world. Empretec distinguishes itself from other training by offering a behavioural approach to entrepreneurship. Research undertaken has demonstrated that there are a series of ten key personal entrepreneurial competencies (PECs) represented by thirty behaviours associated with successful entrepreneurs.

Empretec Personal Entrepreneurial Competencies (PECs):		
1. Goal Setting	6. Fulfilling Commitments	
2. Information-seeking	7. Demand for Efficiency and Quality	
3. Systematic Planning and Monitoring	8. Taking Calculated Risks	
4. Opportunity-seeking and Initiative	9. Persuasion and Networking	
5. Persistence	10. Independence and Self-Confidence	

The Empretec Programme reinforces and strengthens these competencies through an Entrepreneurship Training Workshop (ETW) that involves self-assessment, individual transformation and business stimulation activities. The ETW encourages individuals to focus on their role as entrepreneurs and challenges them to critically examine their personal strengths and weaknesses. The training method is highly interactive and experiential. In addition, training workshops and business forums are organized by Empretec nationally, regionally and internationally. Empretec centres offer entrepreneurs: - A "one-stop shop", providing a range of training and business development services;

- A life-bond: the Empretecos associations (the trainees' peer network) bring together successful, committed entrepreneurs;
- Networking and mentoring: trainers share their training methodology and evaluation tools, in "train the trainers" sessions and offer mentoring;
- Local certified trainers: training is delivered locally in Arabic, English, French, Portuguese, Romanian, Spanish and Swahili.

The Empretec programme, through its Women in Business Award, held every two years, also celebrates women entrepreneurs who have benefited from the Entrepreneurship Training Workshop and have gone on to grow successful businesses and have become role models in their communities.

Source: UNCTAD, www.empretec.net

materials, case studies and include examples of local role models to whom the students can more easily relate. Students can participate in the elaboration of case studies. Role models would ideally include adequate representation of women, youth, indigenous people, and people with a disability, as well as informal enterprises and those based in rural areas (box 14).

c. Train teachers

Teachers are key to instilling basic entrepreneurial skills and to develop enthusiasm and understanding among students. To teach entrepreneurship effectively, the teacher must demonstrate some of the same attributes that he or she would instil in the students. Teachers of dedicated entrepreneurship courses should exhibit key entrepreneurial skills and attributes, lead by example and, in varying degrees, serve as an entrepreneurial role model and mentor for students. Teachers can invite entrepreneurs and practitioners to assist in the classroom as well as in extracurricular activities and serve as role models, mentors or coaches (box 15).

Often entrepreneurship starts with one committed individual, an "entrepreneurship champion" who develops programmes and/or activities from the ground up, either within the formal education system or outside. If successful, they attract others and build momentum. These individuals can be encouraged and supported through incentives and rewards such as university chairs in entrepreneurship which are a very effective way to recognize and provide resources to entrepreneurship faculty champions.

Box 14. Example of successful policies and initiatives in developing entrepreneurship curricula

Global: Aflatoun provides life skills rooted in social and financial education to children aged 6–14. Aflatoun teaching methodology includes school-wide saving clubs and social enterprises and group activities within the community. As children get older they are increasingly expected to design and deliver their own micro enterprise projects. The network of partners from the social, corporate and governmental sectors work together to ensure that the programme is implemented and supported at the local level and adapted to meet local requirements. It operates in 40 countries.

Argentina: The Young Rural Entrepreneurs Project is an initiative of the Argentinean Ministry of Agriculture, Livestock and Fishing. It promotes rural development through entrepreneurship and provides capacity building programmes across the provinces in the country, using training materials specifically developed for the rural population.

Brazil: The Entrepreneurial Pedagogy Methodology (EPM) is a pedagogical approach designed to support entrepreneurial learning in elementary education (ages 4 to 17). The programme targets the poor population and it utilizes entrepreneurship as a tool for fighting poverty, generating social change and local development, and building social justice.

Global: The Entrepreneurship Curriculum Programme (ECP) developed by UNIDO aims at stimulating entrepreneurial talents among young people by enhancing their ability to identify economic opportunities and by developing other commercial skills such as creativity, innovation, planning and leadership, which will aid them in their professional life. In order to start familiarizing youth with the entrepreneurial potential of ICT, UNIDO, in partnership with Hewlett-Packard, developed tailored ICT training modules within ECP.

Singapore: Singapore Management University has developed core programmes that encompass technologyrelated subjects such as IT and the law, data management, software development and intelligent organizations as well as entrepreneurship-related subjects such as business creation, small business consulting, and entrepreneurial finance.

Asia: The Consulting Based Learning for ASEAN SMEs (COBLAS) programme was developed by establishing a tripartite network with academia, local SMEs and students. The programme is supported by the ASEAN entrepreneurship research group and implemented in 10 universities in Cambodia, Indonesia, Laos, Malaysia, Myanmar, Thailand and Viet Nam since 2003 and coordinated by the Waseda University in Japan. The programme created a teaching syllabus with 60 percent common content and 40 percent customized local content, and ASEAN COLBAS textbooks for each country.

Source: UNCTAD Inventory, www.unctad.org/epf

To date, most of the teacher training initiatives and networks exist at the higher educational level. More could be done at secondary and vocational levels by providing entrepreneurship teacher training through seminars, platforms of learning and exchanges with entrepreneurs. Expertise and programmes in the area of entrepreneurship education could be further disseminated through entrepreneurship educators' networks at national, regional and international levels.

d. Partner with the private sector

One of the key success factors for entrepreneurship education is the effective engagement of the private sector. Existing firms, and especially larger (including foreign) corporations have a strategic interest in developing the competencies of local suppliers and often take part (e.g. through cost-sharing) in local skills development and upgrading programmes (box 16). Through corporate social responsibility initiatives, many large companies contribute to the local economy, working with local suppliers to strengthen their businesses or to establish new ones that provide goods or services. There are many examples of such initiatives, notably from UNCTAD's Business Linkages Programme, which facilitates the creation of linkages between international firms and domestic small and medium-sized enterprises in developing countries.⁹

Developing countries can also tap into mentoring networks, both nationally and internationally. The contribution of mentorship programmes can range from providing guidance and support to investing in a mentee's company. One of the most important contributions that mentorship relations bring to entrepreneurs is the transfer of tacit knowledge (box 17).

A large number of private enterprises and entrepreneurs finance private entrepreneurship institutes and centres, and at times special programmes within universities. This engagement creates synergies and collaboration between established companies and

Box 15. Examples of selected policies and initiatives to train entrepreneurship teachers

Global: The International Labour Organization's Know About Business (KAB) programme is a training programme for trainers and teachers in vocational education, secondary and higher education designed in a 120-hour course for young students between 15 to 18 years. It can also be used for higher technical education and for professionals involved in enterprise promotion. The course is divided into several modules and includes a business game. KAB is part of the national curriculum for vocational training in Kazakhstan and Kyrgyzstan. It is being introduced and tested in more than 20 countries in Central Asia, Africa and Latin America.

Brazil: In 2010, 16 states and 46 universities participated in the 1st National Award for Entrepreneurship Educators. The scope is to identify, recognize, celebrate and publicize excellence in entrepreneurship education in all forms and at all levels, encouraging the sharing of good practices and curricula. The award also serves to stimulate collaboration among the academics that teach and survey entrepreneurship issues.

Indonesia: In 2011, the annual National Entrepreneurship Teaching Conference, organized by the Ciputra Quantum Leap Entrepreneurship Centre was devoted to the topic of "Entrepreneurship Leadership". At the Ciputra University, teachers are prepared to provide coaching and mentoring during the educational process, guiding the students to achieve their stated goals.

Mexico: Monterrey's Institute of Technology's entrepreneurship programme was initially started by a small group of "entrepreneurship champions" in the teaching faculty, together with local entrepreneurs. To continue fostering and developing the entrepreneurial spirit in students, the Institute for Entrepreneur Development was established to teach the necessary skills to create, implement, consolidate and improve businesses.

China, People's Republic: The China-UK Entrepreneurship Educators Network was launched in 2008 in Hangzhou, China. The network is a collaborative venture with Shanghai Technology Entrepreneurship Foundation for Graduates (STEFG) and the Shanghai Institute for Foreign Trade (SIFT). The aim of the network is to impact on student and graduate entrepreneurship by engaging in effective collaboration between Chinese and UK institutions. The network members, entrepreneurship educators from Chinese and UK institutions exchange good practices, exchange staff and students, and develop joint programmes and materials for entrepreneurship educators.

Peru: The Peruvian Institute for Entrepreneurial Action (Instituto Peruano de Acción Empresarial) is a higher education institution exclusively devoted to entrepreneurs, and UNCTAD's counterpart for the Empretec programme in Peru. Many of its professors have their own business and, therefore, have a clear understanding of the needs and challenges of their entrepreneurial students. It has campuses across the country.

Source: UNCTAD Inventory, www.unctad.org/epf

start-ups. It becomes easier for more experienced entrepreneurs to "teach and "mentor" in these institutions. Governments should consider means to encourage and facilitate such sponsorship, including by providing incentives. Private sector initiatives and not-for-profit organizations are also involved in providing forms of entrepreneurship education and skills development to target groups in communities to enable poor people to enhance their opportunities for self-employment. They may also support social entrepreneurs that play a role in sustainable development in their communities.

Finally, international business can play a critical role in expanding access to entrepreneurship education through technology and media. Not only can technology and media facilitate the development of innovative interactive programmes and materials, but they can also help reach larger audiences, including those in developing countries or regions which might not otherwise have access to entrepreneurship education. Leading IT companies such as Microsoft, Cisco, Intel, EMC, HP among others have been very proactive in this field.

Box 16. Examples of selected policies and initiatives in partnering with the private sector

Global: Through partnership with UC Berkeley, Intel provides Entrepreneurship Theory to Practice Seminars at universities around the world. In addition, the Intel + UC Berkeley Technology Entrepreneurship Challenge (IBTEC) seeks business plans that commercialize new and truly innovative technologies. This programme, initially conceived for emerging markets, has spilled over to developed countries. Over 600 technical faculties have been trained to bring elements of technology entrepreneurship to their students. In some countries this initiative has been supported by matching or full funding by the Government.

Philippines: The Philippine Center for Entrepreneurship (PCE) was set up as a private sector-funded institution and supports major entrepreneurship programmes and projects of various schools, NGOs, and private corporations. The Center's primary goals are to create awareness about entrepreneurship, to enhance the curriculum and teaching skills in entrepreneurship education at all levels and to affiliate with academia.

China, People's Republic: The Bright China Foundation is devoted to spreading entrepreneurship education across China, through a private-sector approach. The Foundation runs many programmes, including a youth entrepreneurship education initiative. It is active in 11 provinces, reaching some 5,000 young people. It works with the vocational department of the Ministry of Education, but operates its own schools and deploys its own teachers in addition to working with teachers employed by the public school system.

Global: TechnoServe Business Solutions to Poverty is an organization that works with public and private partners and focuses on empowering entrepreneurs, building businesses and improving the business environment through projects across the world. It has courses and camps that teach basic entrepreneurship to youth and adults. Week-long camps at universities and technical institutes involve private sector mentors and work hand-in-hand with capital providers.

Global: FastTrac is a practical business development programme designed to help entrepreneurs hone the skills needed to create, manage, and grow a successful business. FastTrac participants work on their own business ideas or ventures throughout the course. FastTrac programmes are shaped and taught by entrepreneurs. They combine facilitator-led sessions, small-group exercises, guest subject-matter experts, peer-to-peer idea sharing, and business coaching and mentoring.

Global: Launched in March 2008, the *Goldman Sachs Ten Thousand Women Initiative* is investing \$100 million over five years to provide 10,000 women around the world with a business and management education. By supporting partnerships between a global network of universities and non-profit organizations, the initiative funds business and management education certificate programmes and offers a suite of services for programme participants, including mentoring, networking, access to capital opportunities and professional development activities.

Panama: The United States-based NGO Vital Voices chapter is working together with UNCTAD's Empretec programme in a *mentorship initiative* linking city-based women entrepreneurs with rural-based entrepreneurs. All selected mentors for this programme initially begin as mentees. Vital Voices' mission is to identify, invest in and bring visibility to women around the world to unleash their leadership potential to transform lives and accelerate peace and prosperity in their communities.

Source: UNCTAD Inventory, www.unctad.org/epf

Box 17. E-mentoring platform: UNCTAD's collaboration with Swiss-based institutions

Innovative local entrepreneurs in developing countries contribute to social empowerment, sustainable endogenous growth and more employment opportunities for the poor. However, unless these entrepreneurs have basic training in management and accounting and get connected to a larger business network, there is little prospect for these local entrepreneurs to grow beyond their respective neighbourhood.

The E-mentoring Platform, which was developed in the first phase of NCCR Trade II by ETH Zurich, WTI in collaboration with the UNCTAD's Division on Investment and Enterprise and the African Technology Development Forum, aims to support growth-oriented entrepreneurs in developing countries in general, and Africa in particular. The platform will link them to possible problem-solvers, business partners and investors in other parts of the world. The e-platform will generate market intelligence and follow-up business development services, with a focus on export activities. Mentors will also help local entrepreneurs in Africa and the Middle East generate innovative and bankable business plans in priority sectors and in promising export activities, and turn these plans into operational projects.

The strength of this e-platform is the empirical foundation of its design, the numerous and valuable feedbacks to the test-platform and the large network of entrepreneur coaching and mentoring organizations in developed and developing countries that joined the initiative to create and maintain a large database of registered entrepreneurs and mentors. UNCTAD Empretec Centres in Africa and the Middle East also assist and coach the registered entrepreneurs in this particular region.

Source: match.atdforum.org
3.3. Enhancing Entrepreneurship Education and Skills Development: A checklist of key questions

- Do national curricula recognize entrepreneurship as a subject? Is it integrated across other disciplines?
- Do policies promote key entrepreneurial skills training in schools including both *attitudes* and *enabling* skills?
- Do policies recognize the specific needs of youth, women and other target groups?
- Are entrepreneurship training programmes offered outside the formal education system? Do these programmes address low-literacy groups and those in rural areas?
- Are there policies for introducing more interactive and experience-based teaching approaches in the educational system?
- Are schools engaged with business practitioners and local entrepreneurs?
- Has entrepreneurship been explicitly recognized as an objective of the national curricula for vocational, technical and commercial school of secondary level?
- Have provisions of specific training and incentive for teachers been introduced?
- Do curriculum designers develop local case studies and entrepreneurship course materials to be used in the classroom?
- Are academic institutions encouraged and supported in providing training, counselling, diagnostic and advisory services to early-stage entrepreneurs?
- Is extracurricular entrepreneurial activity promoted (e.g. student activities, business plan competitions, business development programmes, etc.)?
- Have national entrepreneurship educators' networks been established to facilitate the application of programmes?
- Is private sector funding leveraged for entrepreneurship education?
- Are there mentoring and coaching available to develop entrepreneurs' skills?

4. Facilitating Technology Exchange and Innovation

4.1. Introduction

Entrepreneurship, technology and innovation are mutually supportive. Technology provides entrepreneurs with new tools to improve the efficiency and productivity of their business, or with new platforms on which to build their ventures. In turn, entrepreneurs fuel technological innovation by developing new or improving existing products, services or processes and ensuring commercialization. In developing countries, both angles are important, to varying degrees, depending on the level of local economic development, the rate of adoption of technologies in use internationally, and the innovation capabilities of local firms or research institutions. Taking into account the two-way relationship between technology/innovation and entrepreneurship, table II.4 presents a synopsis. Fostering innovation and technology in a country involves a complex set of relationships among the different actors involved. To help coordination and communication between those actors, many countries develop a National System of Innovation (NSI).¹⁰ An NSI could include the promotion of entrepreneurial activity and investment in pro poor technologies and agricultural innovations with a focus on needs-based innovation. This is particularly relevant, as the majority of innovations in developing countries stem from incremental knowledge and innovations in traditional sectors, including agriculture.

4.2. Policy objectives and policy options

a. Support greater diffusion of ICTs to the private sector

Entrepreneurs can greatly benefit from the use of modern ICTs in their business practices and policymakers should raise awareness of the

TABLE II.4. FACILITATING TECHNOLOGY EXCHANGE AND INNOVATION		
POLICY OBJECTIVES	POLICY OPTIONS	
a. Support greater diffusion of ICTs to the private sector	 Launch awareness and capacity-building campaigns on ICT use Stimulate the introduction of ICT into business Support the development of on-line and mobile market information platforms Provide training on ICTs to target groups such as women and rural entrepreneurs 	
b. Promote inter-firm networks that help spread technology and innovation	 Promote horizontal linkages through cluster development Provide assistance for standardization and quality certification to networks of local enterprises (including social and environmental standards) Promote business linkages through supplier development. 	
c. Build bridges between public bodies, research institutions, universities and the private sector	 Identify joint research activities with clearly designated participants and beneficiaries Promote PPPs and mixed public/private structures to diffuse innovation Develop market friendly university-industry collaboration Promote institutional synergies at the sectoral level 	
d. Support high-tech start-ups	 Establish high-tech business incubators, knowledge hubs and science parks Facilitate start-ups that commercialize innovation Build networks in knowledge intensive sectors with leading science experts and academics around the world Give researchers and innovators streamlined access to cost-effective patent protection 	

Source: UNCTAD.

advantages of ICTs and take concrete measures to encourage their use. The ways in which entrepreneurs may take advantage of different types of ICTs varies according to their firms' size, industry and marketorientation. The forms in which especially microentrepreneurs have appropriated ICTs by making innovative use of the opportunities which they offer have sometimes surprised policymakers—from the extensive adoption of SMS and the use of airtime as currency to the rapid take-up of mobile transaction services in some countries.

Evidence from numerous developing countries indicates, for example, that use of mobile phones is increasing among rural entrepreneurs, and is contributing positively to enterprise growth and to the efficiency and reach of markets. Entrepreneurs can now obtain market information directly over wide distances and across a range of market locations to give them a better understanding of the options for buying and selling agricultural and other goods and services. Policymakers can support these developments by developing on-line and mobilebased platforms for timely and relevant market and price information (box 18).

Relevant policy options include training and capacitybuilding programmes for entrepreneurs; providing incentives for introducing ICTs and modernizing business operations; and – more generally – a sound regulatory environment that increases ICT affordability. In some countries, women tend to have lower ICTs literacy levels than men as a result of lower education levels and high cost of access. Women also have to deal with the challenge of work-life balance and ICTs can be a useful tool for time management and ease access to support services. In some cases, policymakers have subsidized capacity building and the diffusion of devices such as mobile phones to target specific groups such as women or rural entrepreneurs.

b. Promote inter-firm networks spreading technology and innovation

Competitive industrial clusters, in which firms reap the benefits of physical proximity and horizontal networks, can help generate opportunities for entrepreneurs to access new markets (including through exports) and resources, and to acquire new skills and capabilities. Setting-up competitive industrial clusters can also be an important factor in attracting foreign direct investment. Such clusters, in which SMEs grow through specialization, inter-firm collaboration, knowledge spillovers and subcontracting, have been the key to success for many enterprises in developing countries in sectors such as ceramics, garments,

Box 18. Examples of selected policies and initiatives to support diffusion of ICTs

China, People's Republic: The "Home Appliances Going to the Countryside" initiative promotes greater access to ICT in rural and remote areas by encouraging enterprises to sell electronic devices to rural subscribers at a subsidized rate. Among the products promoted are mobile phones, computers and other ICT devices. After the implementation of the pilot programme in the provinces of Shandong, Sichuan and Henan, the Ministry of Commerce and Ministry of Finance expanded the initiative to cover the entire country in 2009. *For more information, see UNCTAD's Information Economy Report 2010 (www.unctad.org/ier2010).*

Panama: In collaboration with the Government of Panama and four partner United Nations agencies, UNCTAD is implementing a Joint Programme on "Entrepreneurship Network Opportunities for Poor Families". In 2010, specific mobile device exercises were integrated into UNCTAD's Empretec entrepreneurship training for micro-entrepreneurs. Although most of the entrepreneurs had their own cell phones, the majority used them only to communicate with friends and relatives. As a result of the Empretec workshop, participants subsequently started using their cell phones to store clients' contact details, to calculate costings and to send texts for marketing purposes.

Uganda: The CELAC (Collecting and Exchanging Local Agricultural Content) initiative is helping farmers and rural entrepreneurs organize their production and distribution using information provided over mobile phones as well as other ICT tools. By promoting the use of ICT methods and knowledge sharing, the initiative aims to enhance poverty reduction and food security. For instance, CELAC provides farmers and rural entrepreneurs with "How To Guides" for agriculture and livestock breeding which can be downloaded in several languages.

Source: UNCTAD Inventory, www.unctad.org/epf

leather and shoes, as well as electronics, auto-parts and biotechnology. Clustering and networking can help local enterprises to innovate and continuously upgrade; policy measures can facilitate this, for example, by providing assistance to cluster-based companies in meeting international quality standards.

The technological capacity of local enterprises is also enhanced through vertical trade and investment linkages, upstream and downstream from the activities of large, often multinational, firms. These large firms increasingly focus on core competences and outsource non-core activities, thereby opening up new markets for smaller enterprises. Outsourcing may be encouraged by facilitating non-equity modes (NEM) of business collaboration, such as franchising and licensing. Linkages between multinational corporations and local SMEs can allow enterprises in developing countries to move up the technological and management ladder and become part of global and integrated chains of production. Often, small local firms manufacture parts or provide services for large firms, or they offer customer services related to the products of large firms (repair, customization). Many firms also operate on the basis of licenses or franchises, which is an increasingly important route to entrepreneurship development.

Governments and entrepreneurship development agencies need to acknowledge that in many instances small and informal actors require technical support and capacity building in order to overcome the constraints to the integration in value chains. Meeting international quality standards is a challenge for many local suppliers in developing countries. Technological upgrading programmes providing low cost technical assistance for the adoption of quality practices can be important to facilitate ties with large international buyers. Corporate Social Responsibility (CSR) standards of large, often multinational, firms may be a particularly important hurdle for small local entrepreneurs. Support in meeting such standards, and gradual stimulation of standard adoption could be important for entrepreneurship development. Policymakers could also promote industry efforts to share CSR compliance information and where possible encourage firms to merge CSR compliance programmes with a view to reducing the number of audits and inspections.11

When feasible, governments may consider adopting international social and environmental standards such

as ISO14000 and ISO26000, in public procurement, providing adequate support to local firms and allowing for appropriate implementation timetables, thereby making local suppliers ready to enter sustainable value chains. Mentoring programmes that bring together experienced suppliers and the next generation of business-owners may help in exchanging information and experience, and provide stimulus through awards and grants.

Governments can foster export-oriented industrial clusters and networks through appropriate trade policies. In addition, governments can promote business linkages between large and small enterprises by facilitating partnerships and supplier development programmes. In such programmes, large enterprises develop the capacity of local entrepreneurs and local suppliers by mentoring them and transferring technology. In return, large enterprises have access to a supplier network which can quickly and flexibly meet their needs. This increases the competitiveness of the large and small enterprises alike. For example, Penang, Malaysia became the "Silicon Island of the East" by establishing a smart public-private partnership. Large enterprises, attracted to the island's industrial zones by foreign direct investment policies, were encouraged to set up supplier development programmes which nurtured local entrepreneurs and small businesses. These local enterprises became world-class suppliers in their own right (box 19).

c. Build bridges between public bodies, research institutions, universities and the private sector

The innovation process of a country is increasingly dependent on the interaction between the government, academia (i.e. public and private education institutions, universities and research laboratories) and the private sector. This interaction involves the fluid exchange of information, ideas and technologies.

With fewer barriers between academia and the private sector, university research can be more in tune with the needs of the market and have a bigger impact on the wider economy. Universities should be stimulated to move beyond the confines of the academic sphere and to become actively involved in the innovation and entrepreneurship development process by fostering commercialization of their research and by focusing on market needs, which may involve the adaptation of advanced technologies to local requirements, or the development of grassroots or pro-poor technological

Box 19. UNCTAD's Business Linkages Programme

UNCTAD's Business Linkages Programme is a multi-stakeholder initiative that seeks to design and implement the necessary measures, incentives and strategies to transform linkages between multinational corporations and SMEs into sustainable business relationships that improve the performance, productivity and efficiency of all participants. Key stakeholders include multinational corporations, investment promotion agencies, business associations, local banks and business services providers, relevant government departments, and SMEs. Addressing the issue of business linkages not only from an operational but also from a policy perspective, a major focus of the programme is on empowering project partners to promote self-sustaining business linkage activities above and beyond the life cycle of individual projects. Drawing on hands-on experience from nine national programmes on three continents to date (Argentina, Brazil, Dominican Republic, Mozambique, Peru, United Republic of Tanzania, Uganda, Viet Nam, and Zambia), the programme is based on the conviction that a favourable business environment, early involvement and close cooperation between the public and private sector and effective technological capacity building are vital to sustainable business linkage development.

For more information, see: www.unctad.org/enterprise

solutions. At the same time, private firms will be increasingly interested in training, sharing of knowledge and collaboration with universities.

Governments have an active entrepreneurial role to play in facilitating such interaction. This can be done through initiatives that encourage the involvement of universities in technology transfer, providing incentives for collaborative projects encouraging research, technology transfer and commercialization of science and technology or the development of government research labs. Experts and academics can gain exposure and knowledge when moving to work and study in centres of excellence in their respective fields. Local institutional networks and public-private sector partnerships are also key in promoting entrepreneurial innovation in all sectors of the economy. Public-private innovation centres can also provide speedy and flexible technological solutions to respond to market needs and to link local innovators with commercial investors (box 20).

d. Support high-tech start-ups

There is a spectrum of possible policy interventions to support technological innovation and high-tech firms. Technology hubs and incubators are often created to establish spatial agglomerations of growth-oriented high-tech firms, ranging from large technology research hubs to small science parks. These facilities typically provide a range of core support services such as infrastructure, office buildings or shared workspaces as well as targeted business development programmes, mentoring services and advice on accessing finance or protecting intellectual property. They are often situated close to universities and research institutes so as to provide access to technological advice and to other scientifically or technically minded entrepreneurs. Various models of high-tech business incubation exist, ranging from highly intensive services for a small number of firms to less intensive services for a larger number of firms. Incubators may focus on a particular sector, often ICT, or be more general in nature. They may purposely focus on exports or on developing new products for the local market.

Governments can also facilitate early stage enterprises that commercialize high-tech ideas. Public innovation awards, for example, may help entrepreneurs getting new high-tech projects started. Governments may also give researchers and innovators preferential access to cost-effective patent information and patent protection. Safeguarding property protection is important to convince key stakeholders to move technology from the laboratory to incubators and science parks for commercialization.

If support services are not market-driven and focused on high-tech start-ups' genuine needs, they are unlikely to achieve positive outcomes, despite often high costs. The experience of a range of developing economies suggests that efforts to promote technology start-ups should not concentrate on isolated regions with limited infrastructure and scarce availability of skilled human resources. Rather, highgrowth business incubation facilities should be located close to commercial, industrial or scientific hubs, where a critical mass of entrepreneurial opportunities exists and expansion of economic activity is already

Box 20. Examples of selected policies and initiatives to build bridges among stakeholders

Zambia: The University of Zambia's, Technology Development and Advisory Unit, was set up as an intermediate technology development and consultancy unit within the School of Engineering. Its main objective is to help small-scale producers in urban and rural areas access skills and technologies that can help them generate wealth and jobs. The Unit specializes in adapting advanced technologies to develop effective but simpler products that use locally available resources, skills and knowledge.

India: Several networks in India support grassroots innovations. The Honey Bee Network is a network of NGOs, entrepreneurs, academics and policymakers supporting individual and community innovations at the grassroots level. Similarly, the Grassroots Innovation Augmentation Network in the state of Gujarat provides funding for promising local innovations and helps to link innovators to research centres and commercial investors.

Republic of Korea: Various policy measures have been put in place to reinforce networking for technological innovation among enterprises and industry, academia and research institutes. For example, the Industry-University-Research Consortium Programme seeks to boost the technological capabilities of manufacturing SMEs through collaborative technological development with universities. About 220 consortia were formed in 2005 to support 2,700 SMEs in developing new technologies.

Brazil: The Government enacted the Brazilian Innovation Law of 2004 (*Lei da innovacao*), which provides support and incentive mechanisms to foster strategic alliances for cooperative projects between universities, technological institutes and local enterprises. For instance, the law enables businesses, including micro and small enterprises, to use the laboratories, infrastructure and human resources of technological institutes for their research activities.

Singapore: The Government's enterprise development agency, SPRING Singapore, through its Technology Enterprise Commercialization Scheme provides early stage funding for the commercialization of proprietary technology ideas. It is a competitive grant in which proposals are ranked based on the evaluation of both technical and commercial merits. The scheme supports up to 100 per cent of qualifying costs for Proof-Of-Concept projects and up to 85 per cent of qualifying costs for Proof-Of-Value projects.

Poland: The Innovation Voucher Programme is an initiative of the Polish Agency for Enterprise Development which began in 2008. It is designed to encourage micro and small businesses to initiate contact with scientific institutions including universities and research centres. Vouchers amounting to 3750 Euros per beneficiary can be used to purchase R&D services from scientific institutions. As a result of this initiative, businesses, which do not usually engage with research institutions, aim to boost their productivity and competitiveness by developing new or improving existing technologies.

Source: UNCTAD Inventory, www.unctad.org/epf

taking place in a competitive manner. In many Asian economies, such as the Republic of Korea and Taiwan Province of China, science hubs and incubators focus on building the capacity of local suppliers. Policymakers may also wish to explore options of linking up with existing hubs and clusters, as well as with leading science experts and academics around the world, since innovation often takes place beyond the national level.

In deciding whether or not high-tech business incubation facilities are feasible and the most appropriate tool given local circumstances, policymakers need to focus on a few critical questions such as what services to offer, whether and how to support companies beyond basic facility services (and based on what criteria), and how to set up the facility's governance structure. In some incubation facilities, mentoring services are offered, frequently free of charge by successful entrepreneurs wishing to share their experience with others. Business incubators around the world have many different types of governance structures. Experience suggests that, at their inception stage, many successful initiatives depended on technical assistance supported by donors' funding, public-private partnerships between local government and a few high-quality "anchor tenants" that subsequently spawn further start-ups through spin-offs or sub-contracting relationships (box 21).

Box 21. Examples of selected policies and initiatives to support high-tech start-ups

Egypt: The Ministry of Communications and Information Technology has launched a strategy to support SMEs in the field of ICT. It includes financial support, partnerships with local SMEs through the ministry's projects, an entity to unify all ICT companies and coordination among the Ministry and companies to address problems and discuss requirements. The strategy developed by the Ministry of Communications and Information Technology with the assistance of UNCTAD targets the need to strengthen the ICT uptake among SMEs in Egypt. *For more information, see UNCTAD's ICT Policy Review: Egypt, www.unctad.org.*

East Africa: Several innovation labs, called mobile development labs or "mlabs" have opened in Kenya and South Africa. For example, M:Lab East Africa is a consortium of four organizations that nurtures and helps build sustainable enterprises in the knowledge economy. Their mission is to "facilitate demand-driven innovation by regional entrepreneurs, ensuring that breakthrough low-cost, high-value mobile solutions can be developed and scaled-up into sustainable businesses that address social needs." MedAfrica is one of the start-ups which have benefited from M:Lab East Africa. It seeks to improve access to healthcare through mobile phones.

Morocco: The Casablanca Technopark Incubation Centre is a host for innovative ICT projects. Start-ups and SMEs benefit from office space including a wide range of services and resources. For instance, the Centre offers access to funding, an export club and an innovation support fund that subsidizes part or all of the R&D undertaken by the enterprises. In addition, the centre regularly organizes business to business meetings. It is managed by a private company, the Moroccan Innovation Technology Company.

Panama: The City of Knowledge is a non-profit foundation and is Panama's business, scientific and technological park. It is committed to a development model based on innovation, entrepreneurial culture and sustainability. By physically bringing together universities, non-governmental organizations and private companies, it fosters exchange and synergies between institutions and creates a framework intended to foster entrepreneurial culture and development of innovative, sustainable business management models.

Source: UNCTAD Inventory, www.unctad.org/epf

4.3. Facilitating Technology Exchange and Innovation: A checklist of key questions

- Are there awareness and capacity-building campaigns on ICT use?
- Is there a policy to promote diffusion of technologies to SMEs?
- Does the government facilitate or provide training and support for technology upgrading in small firms?
- Are there initiatives to facilitate and encourage exports, business linkages and industrial clusters?
- Are there supplier development programmes to engage SMEs in the value chain of larger companies?
- Does the government provide assistance for standardization and quality certification for local enterprises to meet required standards, including social and environmental standards?
- Does the government encourage and support linkages for university-industry partnerships?
- Does the government provide support for applied research and commercialization of science and technology?
- Does the government provide support infrastructure or engage in public-private partnerships to establish business incubators, clusters, networks and science parks for science and technology commercialization?

5. Improving Access to Finance

5.1. Introduction

Inadequate access to finance remains a major obstacle for many aspiring entrepreneurs, particularly in developing countries. As recent studies confirm, the global financing gap for micro, small and mediumsized enterprises remains enormous.¹² Entrepreneurs of all types and sizes require a variety of financial services, including facilities for making deposits and payments as well as accessing credit, equity and guarantees. Table II.5 provides a synopsis of actions that can be taken to improve access to finance.

Many entrepreneurs in developing countries can benefit from targeted capacity building in financial literacy and from innovative delivery mechanisms using modern banking technologies. Special attention should be given to assist innovative, high-growth firms in the area of green technology and sustainability, which often need to attract distinct forms of financing, including equity and venture capital. Policymakers have many options at their disposal to facilitate access to various types of financial services.

Several high-profile initiatives, such as the G20's SME Finance Challenge, have recently published policy guides on innovative proposals and best practices to facilitate access to finance for developing country SMEs.¹³ Recent work by the OECD¹⁴ is addressing the fact that there is not only an SME lending gap but also an information gap on financial intermediaries' SME lending activity, which policymakers must bridge if they are to monitor the impact of their policies. There is also a need to understand the implications for SME lending of recent efforts to overhaul global financial regulations, proposed by the Basel Committee on Banking Supervision¹⁵ ("Basel III"). The UNCTAD Entrepreneurship Policy Framework will focus on a

TABLE II.5. IMPROVING ACCESS TO FINANCE			
POLICY OBJECTIVES	POLICY OPTIONS		
a. Improve access to relevant financial services on appropriate terms	 Develop public credit guarantee schemes Stimulate the creation of private mutual guarantees Promote FDI in financial services, supply chain finance ("factoring") and leasing Facilitate collateral-free loan screening mechanisms 		
b. Promote funding for innovation	 Provide incentives to attract venture capital investors and business angels Encourage equity and "risk capital" financing modalities Provide performance-based loans and incentives for innovation and green growth Facilitate the use of intellectual property as collateral 		
c. Build the capacity of the financial sector to serve start-ups	 Establish a national financial charter Promote public-private sector "access to finance partnerships" for specific groups Provide capacity-building grants and technical assistance to expand lending activities (e.g. financial service provision through post offices and other "proximity lenders"; use of new banking technologies to reach rural areas) 		
d. Provide financial literacy training to entrepreneurs and encourage responsible borrowing and lending	 Set up financial and accounting literacy training Undertake appropriate supervision of financial products offered to social and micro-entrepreneurs Expand private credit bureau and public credit registry coverage 		

Source: UNCTAD.

limited set of issues that directly impact access to finance for entrepreneurial start-ups and financial inclusion of entrepreneurs from various backgrounds.

5.2. Policy objectives and policy options

a. Improve access to relevant financial services on appropriate terms

Many entrepreneurs in developing countries do not have access to the financial services that they need, or only at prohibitively high interest rates and against excessive collateral requirements, even though their business plans and ideas may be viable. This is generally due to market failures such as high costs for lenders to verify financial information, poor infrastructure in rural areas (making it expensive for loan officers to reach widely dispersed clients), problems of contract-enforceability or the inability of entrepreneurs to provide collateral in the face of weak property rights or non-existent land titles. These problems often disproportionally affect specific groups of entrepreneurs such as women, minority, or youth-owned enterprises. In the long term, the most appropriate policy measure to address these problems is to eliminate the underlying market failure. In addition, however, there are some policy tools that policymakers may use to improve entrepreneurs' access to financial services and the terms on which they can be accessed.

The most commonly used method of facilitating access to finance for underserved entrepreneurs is through public credit guarantees. The key features of such schemes-such as eligibility criteria, coverage ratio, fees, and payment rules-vary substantially between schemes. Guarantee schemes may target particular groups of entrepreneurs (such as hightech start-ups, women, youth or social and microenterprises) via strict eligibility requirements, ensuring a high degree of additionality (i.e., restricting guarantees to entrepreneurs who would not have had access to finance otherwise). Moreover, by sharing risk, credit guarantees limit the uncertainty entrepreneurs and start-ups face, thereby reducing the precautionary motive for holding large cash balances and releasing savings into the formal financial system, where they can become available for further intermediation.

Public credit guarantees may be supplemented by *private mutual guarantee associations* (MGAs). Mutual guarantee associations have a more market driven

approach than public guarantee schemes, replacing missing collateral by acting as intermediaries between banks and their members. MGA guarantees are usually counter-guaranteed by public authorities thus creating a public-private sector partnership. Governments that enter into such partnerships can thus expand the national guarantee activity at modest cost.¹⁶

In addition, promoting FDI in financial services can improve access to credit for local entrepreneurs. Financial sector FDI from well regulated source countries can help developing countries improve the mix of financial services and risk management tools. With the expansion of cross-border activities by small and medium sized firms from the South, developing country banks are also playing a growing role because they are willing to penetrate markets where other banks are reluctant to go, providing an important new source of external finance for developing countries and economies in transition. Promoting financial sector FDI should, however, be accompanied by improved regulation and supervision.

Another proven means of increasing access to finance for entrepreneurs that are active as suppliers to larger firms in the value chain is the use of various forms of "factoring" and "leasing". For example, a supplier could obtain a loan by providing a signed purchase order from its large buyer as collateral. The large buyer then pays the invoice for the goods directly to the lending institution, which remits the payment to the supplier net of the loan principal and interest. This effectively transfers credit risk from the lender to the large buyer, leaving the risk that the supplier will not deliver the ordered goods (which is mitigated by the large buyer's screening of the suppliers it chooses to work with). This kind of supply chain finance is a tool that policymakers could promote to improve access to finance for entrepreneurs in developing countries where financial information is weak, enabling suppliers to borrow based on their buyer's credit rating, which, especially in the case of large domestic companies and multinational enterprises, is usually vastly superior to that of the small entrepreneur.

Leasing provides financing of assets, such as equipment, machinery, vehicles for a set period of time. Leasing institutions, companies or equipment producers purchase the assets, usually as selected by the lessee, who makes periodic payments at an agreed interest rate. At the end of the lease period, the equipment can be purchased, returned, discarded or sold by the lessee. Developing the leasing sector increases the range of financial products in the marketplace and can help develop domestic production by encouraging different forms of buyer-supplier schemes.

Many entrepreneurs in developing economies start their business informally, sourcing start-up and working capital from relatives and friends, including through remittances from expatriate family members. It is important to recognize these realities and provide appropriate support, for example, by working with private sector providers to lower the cost of remittances and money transfers.

More recent innovative tools to facilitate access to finance for developing country entrepreneurs include measures that attempt to dispense with conventional collateral requirements altogether. One such approach, for example, is collateral-free lending based on psychometric screening of the entrepreneurial profile of loan applicants. Encouraging experiences in this regard include those of EMPRETEC Argentina as well as Harvard University's Entrepreneurial Finance Lab. Innovations in access to finance often exhibit a "bandwagon effect" once an early adopter has proven their viability. Policymakers may wish to keep an eye on such experiments and provide support where appropriate (box 22).

b. Promote funding for innovation

Entrepreneurs running innovative and/or high-growth companies frequently have quite distinct financing needs from the general SME and start-up population, such as a need for risk or venture capital that does not drain resources for interest repayment during their start-up and expansion phases. However, even in advanced economies, only a tiny fraction of firms are able to attract this kind of funding. Compared to other financing initiatives, venture capital funds have a limited scope both in terms of number of firms reached and total amount of funding committed, as they focus on the relatively riskier segment of firms with the highest growth and innovation potential. Successful investments of this kind can act as catalysts that transform industries and sectors. Examples include mobile applications and green technologies such as renewable energy-areas in which developing countries have the potential to "leapfrog" technological developments in more advanced economies.

The design of schemes aimed at mitigating the risks associated with early-stage entrepreneurs may include the encouragement of wealthy individuals prepared to provide financial support and knowhow to entrepreneurs (so-called "business angels").

Box 22. Examples of selected policies and initiatives to improve access to financial services

Chile: FOGAPE (Fondo de Garantía para Pequeños Empresarios) is a Chilean public guarantee fund to increase access to finance by providing partial credit guarantees to banks for entrepreneurs who lack the necessary collateral to gain access to credit, or need longer maturities. FOGAPE guarantees are risk-sharing instruments meant to leave some risk with the lenders. The fund was originally financed by the Government, but over time profits from operations have contributed significantly to the fund's capital base.

Ghana: The *Mutual EMPRETEC Guarantee Association* has been set up in co-operation with a local bank and initial support from DFID. According to the scheme, entrepreneurs with the EMPRETEC programme ("Empretecos") can form groups in order to jointly save a fixed amount of money. This amount is then matched by a development agency. The funds are deposited in the local bank, which uses the deposit from the guarantee scheme as collateral against loans to Empretecos. The Empretecos meet regularly to discuss progress and who should be approved for a bank loan.

Mexico: *NAFIN (Nacional Financiera)* offers on-line factoring services to SME suppliers. Two types of factoring are offered: (i) Factoring offered to SMEs without any recourse, collateral, or service fees, at variable risk-adjusted rates; and (ii) Contract Financing, which provides financing up to 50 per cent of confirmed contract orders from big buyers with NAFIN supply chains, with no fees or collateral, and a fixed rate. As of mid-2009, the programme comprised 455 big buyers and more than 80,000 SMEs, and had extended over \$60 billion in financing. About 20 domestic lenders participate in the programme.

Global: *Harvard Entrepreneurial Finance Lab* utilizes a psychometric testing process that incorporates an entrepreneur's attitude, outlook, ability and character to measure risk and future entrepreneurial potential with, EFL claims, the same accuracy as traditional credit scoring models, but without requiring business plans, credit history or collateral. EFL's methodology has been tested on more than 10,000 entrepreneurs across several countries and languages. The initiative is now rolling out its methodology to banks in several developing countries.

Source: UNCTAD Inventory, www.unctad.org/epf

These represent an alternative to formal equity funds, and normally consider smaller-scale investments. A business angel with the right skills can strengthen a venture by, for example, offering marketing and sales experience. Finally, some development-oriented funds financed by donors or international financial institutions can provide funds for small firms, including seed and start-up financing. Among the main funds, there are those operated by the International Financial Corporation, the Small Enterprises Assistance Funds of the United States and Aureos Capital based in the United Kingdom.

Entrepreneurs seeking financing for innovation face a double hurdle because such investment involves considerable uncertainty, information asymmetries and intangible assets to a far greater degree than investment in traditional ventures. Banks' aversion to risk will cause them to avoid loans to ventures that have long gestation periods and uncertain outcomes in terms of new products, processes or markets. Several developing countries have supported the early development of a venture capital industry, for instance, by giving investors *incentives* such as tax rebates and/ or by partially guaranteeing investors' equity. Smaller developing countries may wish to pool resources and work beyond national boundaries, as venture capital firms tend to prefer cross-regional funds to countryspecific funds, allowing greater access to the most promising investment opportunities (box 23).

Strategies for green growth provide entrepreneurs with many opportunities to start-up new businesses across a wide spectrum of activities such as water supply, waste recovery and recycling, habitat protection, eco-tourism, and renewable energy. While entrepreneurs can play a major role, they need access to appropriate types of financing for these new ventures and a level playing field to benefit from green procurement. Financial constraints are especially high for new entrants into eco-innovation since they have no history of success and, in the case of

Box 23. Examples of selected policies and initiatives to promote funding for innovation

Kenya: The Business Partners International (BPI) SME Fund is a private, fixed-life fund that provides equity, quasiequity, and debt instruments to Kenyan entrepreneurs. BPI offers technical assistance to investee companies in order to strengthen management capacity, information systems, and accounting systems, and also provides consulting support for new lines of businesses. BPI can invest up to \$500,000 per deal. To date, BPI has approved more than 50 investments in Kenyan entrepreneurs, with a total value of around \$5 million.

Global: E+Co is an international venture capital fund that specializes in providing debt and equity investments to small and medium-sized renewable energy entrepreneurs in Africa, Asia and Latin America. The fund has mobilized \$280 million in capital to date, providing access to green electricity to an estimated 7 million people across its portfolio of investments.

Republic of Korea: The *Korean Technology Rating System* is a credit scoring model that has been successfully used by agencies of the Government of the Republic of Korea to select SMEs for loans based on their technology. In addition, the Korea Technology Credit Fund has been established with a guarantee against losses incurred on loans. This support to lenders helps SMEs that do not have the tangible collateral to obtain debt financing. They provide guarantees for bank loans, bonds, commercial bills and leasing, with a special emphasis on guarantees for SMEs that have difficulties in qualifying for bank loans.

Africa: *GroFin* is an African venture capital firm that provides long-term "risk capital" to entrepreneurs, linking loan repayment to revenue growth, rather than a fixed interest rate, thereby sharing-in both risks and profits. In addition, GroFin offers, besides tailored finance solutions, expert business support and guidance in all business development stages.

Malaysia: The Government of Malaysia provides *"Pioneer Status"* in the form of tax exemptions to entrepreneurs meeting clearly defined performance-criteria in targeted industries such as ICT and bio-technology. By doing so, it eases the cash flow constraints of innovative high-growth firms and frees up extra resources for re-investment in the company's growth.

Global: The World Business Angels Association (WBAA) is a not-for-profit organization that stimulates exchange of knowledge and practices on angel capital financing for high growth and innovative start-ups across the world. The WBAA membership consists of more than 15 national business angels' networks and associations.

China, People's Republic: When the Government developed a special programme to encourage intellectual property (IP)-based finance and set out to invest in innovative industries, it found that target companies lacked collateral to finance their loans. Therefore, the Beijing IP Office provided funds through the Bank of Communications for 37 small and medium-sized technology companies, for so-called "IP pledge loans".

Source: UNCTAD Inventory, www.unctad.org/epf

eco-innovation, technological and market uncertainty are particularly high, raising risk premiums. Greening products, processes and services takes research and banks might not be willing to finance eco-innovation which is not immediately profitable. Therefore, green growth entrepreneurs may rely on grants, special loans and "green" funds.

Governments can also provide access to finance directly to promising entrepreneurs by setting up specialized loan facilities and/or tax incentives for innovative, high-growth firms. One innovative way of providing "*risk capital*" is in the form of loans that link repayment to revenue growth, rather than a fixed interest rate, thereby sharing-in both risks and profits. However, in all cases of direct public provision of funds for innovation, it is important to implement strict and transparent, preferably performance-based, nondiscriminatory eligibility criteria for such funds, to avoid abuse and waste of taxpayer money.

Innovative, high-growth entrepreneurs can also benefit from an effective intellectual property rights (IPR) regime that would allow them to pledge their *IPRs as collateral* and to include such non-tangible assets in company valuations.

c. Build the capacity of the financial sector to serve start-ups

In developing countries, financial institutions relevant to start-up and growth-oriented entrepreneurs tend to fall into one of four basic categories:

- Commercial banks that have introduced products targeting the SME sector;
- Microfinance institutions (MFIs), including those upscaling to the SME sector;
- Community banks/credit cooperatives/post office banks/agent banking;
- Private equity and venture capital funds.

Policymakers should work with each of these categories to build their capacity to better serve specific segments of entrepreneurs (such as start-ups, high-growth firms, women, youth, rural or minority entrepreneurs). In designing support measures, they should be aware of and leverage the respective strengths and core competencies of each partner institution. For example, microfinance institutions that are scaling-up typically target the lower end of the SME spectrum, with small businesses that have many features in common with normal microfinance

clients. By contrast, commercial banks that are expanding lending to SMEs are generally targeting larger medium-sized firms that require more complex financial analysis, one core competence of these institutions. In order to maximize each participant's contribution, policymakers may develop a shared blueprint for the financial sector's role that is consistent with the country's development strategy. Several countries have concretized this in the form of a national "financial charter". Policymakers can also take the lead in initiating *public-private sector partnerships* involving, for example, financial service providers and local institutions such as business schools in order to target specific segments of entrepreneurs.

In many developing countries where formal financial service provision is poor outside main cities and urban areas, coverage may be expanded through the use of existing institutions with well-developed branch networks, such as post offices, or through "agent banking" whereby retail stores, such as local supermarkets, become agents for banks and provide basic services. Such institutions have the advantage of already being on the ground and having considerable local knowledge. Mutual banks, post office banks and credit cooperatives differ from MFIs in that they are usually associations of memberowned or local government-owned institutions. Close interaction with local clients provides these "proximity lenders" with the capacity to understand and assess client risk more effectively, resulting in their ability to support categories of entrepreneurs who are routinely passed over by commercial banks, yet too large for microfinance. Transaction accounts, often linked to the use of ATMs, are more attractive and cheaper for large parts of the unbanked population (box 24).

Often, financial service providers initially require public support, through *capacity-building grants* and *technical assistance*, in order to expand lending activities to SMEs and entrepreneurs. Public support is particularly useful for adapting lending technologies to serve new constituencies, as well as in building capacity in staff training and information management. On the one hand, for example, MFI up-scaling can entail costs in order to comply with more stringent regulatory and disclosure requirements. Large commercial banks with complex financial information systems, on the other hand, often have to invest considerable resources in staff training in order to move towards a more relationship-based lending model. Staffs at post office banks or agent banks that move into the

Box 24. Examples of selected policies and initiatives to build the capacity of the financial sector

South Africa: A *National Financial Charter* came into effect in 2004. It was the result of negotiations between the Government, business community, labour organizations and community constituencies. The main objective of the charter was to transform the financial sector into a leading force for the empowerment of black entrepreneurs that had historically been sidelined by the Apartheid regime.

Nigeria: The country's Business School's *Enterprise Development Centre (EDC)* coordinates the "Programme for Financing Women-owned SMEs" in public-private partnership with Nigerian banks and the International Finance Corporation (IFC). The initiative consists of an IFC-backed direct credit line for on-lending to women-owned SMEs, coupled with a capacity-building programme for financial institutions to assist them in expanding their reach to women entrepreneurs. Participating banks have received \$15 million in loans but have lent over \$35.5 million (with non-performing loans of less than 0.5 percent). Over 700 women entrepreneurs have been reached as part of the programme, which has had a strong demonstration effect in the Nigerian market, and other financial institutions have started to replicate the model.

Global: Many developed country post offices have begun to offer banking services to offset losses of other traditional revenue lines due to new communication technologies. *Post office banking* has made substantial contributions to the viability of extensive branch networks and can be emulated in developing countries. The Italian postal service, for example, launched 'BancoPosta' in 2000. By 2002 Poste Italiane showed a net profit for the first time in 50 years. This turn-around is largely attributable to the business generated by BancoPosta and has led to an expansion of the Italian post office network which currently stands at over 14,000 branches.

Kenya: Equity Bank has developed a way of increasing its delivery of financial services in rural areas without incurring the large costs involved in setting up a branch network. Instead, the bank has invested in vans that serve as mobile branches, visiting areas on a frequent cycle. Each van is equipped with the hardware and communication capacity to provide a large array of financial services. The bank has also combined this extension of coverage with new savings products adapted to the needs of rural households and micro-entrepreneurs.

Peru: Caja Municipal Sullana is a network of municipal savings banks that is the most important provider of financial services to SMEs in Peru. It provides wireless Personal Digital Assistants (PDAs) to its loan officers, which allow them to process loan payments and collect savings in the field during their client visits.

Source: UNCTAD Inventory, www.unctad.org/epf

provision of financial services also require intensive training. In order to benefit from economies of scale, capacity-building for such institutions should leverage the strength of their extensive branch networks by providing common central services such as training, external auditing, and so on.

Policymakers also have a key role to play in promoting the adoption of *new banking technologies* (e.g., mobile phone banking) that can overcome high transaction costs in reaching rural and remote entrepreneurs, widening access and promoting financial inclusion. Often these technologies also facilitate financial sector supervision, bank monitoring and credit information by digitizing and automating the registration of countless small transactions hitherto outside the scope of formal sector financial reporting. Public support and funding for the rolling-out of new banking technologies can therefore enhance the overall stability and transparency of the national financial system, by building the case for the integration of these technologies with a supervisory agency's financial information system.

d. Provide financial literacy training to entrepreneurs and encourage responsible borrowing and lending

A major barrier to entrepreneurs in the developing world is a generally inadequate level of financial literacy. Poor planning, underestimating market volatility and inadequate accounting practices can all result directly in financial losses for developing country entrepreneurs. These difficulties also restrict entrepreneurs' ability to access finance from lenders who require solid financial information that these businesses lack the financial literacy to provide. Many entrepreneurs can benefit greatly from *financial and accounting literacy* training to ensure responsible borrowing and client protection (box 25). In order to reach critical mass, such programmes require public funding or publicprivate partnerships between different actors in the financial ecosystem. Financial products-especially when offered to poor and vulnerable clients such as social and micro-entrepreneurs-require appropriate supervision and regulation to prevent unsustainable lending. Relevant policy objectives include ensuring

Box 25. Accounting for entrepreneurs and micro-enterprises

UNCTAD has developed an accounting training course for owners and employees of micro and small enterprises with no or limited accounting knowledge. The training workshop content (available in Spanish) is based on the Guidelines for Small and Medium Enterprises (SMEGA) developed by UNCTAD. The programme aims at enabling micro and small enterprises to understand basic accounting, recognize transactions, elaborate simple financial reports and analyze these reports in order to assess business performance and improve results. It also provides information on the basic requirements of local funding institutions that micro-enterprises and entrepreneurs should meet when applying for funding.

For more information, see: www.unctad.org/isar

Box 26. Examples of selected policies and initiatives to improve financial literacy and provide responsible lending

Global: The Finance Alliance for Sustainable Trade (FAST) is a USAID-backed membership association of financial institutions and producers dedicated to sustainable production and trade of sustainable products. Members include socially oriented and alternative lending institutions, SME producers, development institutions and other stakeholders in the agricultural commodities supply chain. FAST has developed a "Financial Literacy Toolbox" providing a comprehensive education package aimed at building the financial literacy of developing country entrepreneurs.

India: In 2007, the Reserve Bank of India launched an initiative to establish Financial Literacy and Credit Counselling Centres throughout the country in order to offer free financial education to urban and rural entrepreneurs.

South Africa: The South African National Credit Regulator—established under the National Credit Act 34 of 2005 and responsible for the regulation of the South African credit industry—has been regarded as a model client protection framework for the developing world. The Act requires the Regulator to promote the development of an accessible credit market, particularly to address the needs of disadvantaged persons, low-income persons, and remote communities. It covers the registration of credit providers, MFIs, credit bureaus and debt counsellors as well as provisions for an effective grievance redress system.

Egypt: *IScore* is public-private sector partnership by the Egyptian central bank. Recognizing its capacity limitations in credit reporting, the Central Bank decided to encourage more active participation from the private sector. Local banks were tasked with forming a private credit bureau, to which was added the historical data from the public registry. This bureau is now looking to expand its data coverage to non-bank financial institutions as well as the MFI sector.

Source: UNCTAD Inventory, www.unctad.org/epf

transparent pricing, avoiding client over-indebtedness, and setting up a statutory grievance redress system.

A cornerstone of most financial systems that efficiently provide access to finance to aspiring entrepreneurs is the easy availability of credit information. Many developing country entrepreneurs find it difficult to obtain credit simply because they have never previously had access to financial services and have had no opportunity to build "reputational collateral" by way of a proven repayment history. In contexts where information on defaults is not currently available, a useful first step is for policymakers to encourage sharing of information on positive repayment histories among existing institutions. Policymakers may require that private credit bureau and public credit registry coverage extends to the repayment records of microfinance institutions to also allow microentrepreneurs to build credit histories. As discussed in the previous section, this can be facilitated by the adoption of new banking technologies. As MFI clients are predominantly women there is an important gender dimension to this measure (box 26).

5.3. Improving Access to Finance: A checklist of key questions

- Are there measures to encourage financial institutions to lend to start-ups and SMEs?
- Does the government require banks and other financial institutions to report their lending by size of firm?
- Are there public-private funds for entrepreneurs?
- Is FDI promoted to broaden access to finance for local entrepreneurs?
- Are factoring and leasing schemes encouraged?
- Are there incentives for venture capital and the development of networks of business mentors or supporters, including business angel networks?
- Are development-oriented funds encouraged to invest in seed capital and small firms?
- Has the government taken steps to improve access to finance for target groups (minorities, youth, women, immigrants, expatriates, those in rural areas, etc.)?
- Is the adoption of financial service provision through post offices and other "proximity lenders"; and *new banking technologies* (e.g., mobile phone banking) encouraged?
- Are effective intellectual property rights (IPR) accepted as collateral?
- Is there a financial charter?
- Does the government provide appropriate supervision and regulation to prevent unsustainable lending?
- Are there formal courses on financial literacy designed and available for SMEs and micro-enterprises?
- Is training available to lenders to design ways to expand lending activities to SMEs and entrepreneurs?
- Are there credit bureaus?

6. Promoting Awareness and Networking

6.1. Introduction

Negative socio-cultural perceptions about entrepreneurship can act as significant barriers to enterprise creation and can undermine the impact of policy intervention in support of entrepreneurship. The impact of regulatory reforms in support of start-ups or to facilitate access to finance for entrepreneurs will be less than optimal if large sections of the population do not consider entrepreneurship as a viable and rewarding option, i.e. if they would only consider entrepreneurship when forced, or out of necessity. Fostering an entrepreneurial culture that positively values entrepreneurs and entrepreneurship is a key determinant of the success of an entrepreneurship policy framework and it is also a crucial factor to overcome the culture of dependency, either from governments or aid donors. Table II.6 provides a synopsis.

Entrepreneurship networks can foster the evolution of an entrepreneurial culture. Network building also serves as an important tool to showcase models, champions and references of success of entrepreneurship as a career option. In developing countries, entrepreneurial network building is particularly important, for a number of reasons:

- *Trust* is crucial for doing business in environments with relatively weak systems of contract enforcement. It becomes even more important for start-ups and new entrants that do not yet have established reputations. To the extent that networks are based on particular identities, it is important to strengthen those that are inclusive along professional lines—rather than, for example, exclusive based on ethnic or socio-economic background lines.
- Inadequate resources for *education* similarly restrict possibilities to advocate for entrepreneurship.
- The *digital divide* has left developing countries with less-than modern communications infrastructure, representing a major impediment to awareness generation on entrepreneurship.

TABLE II.6. PROMOTING AWARENESS AND NETWORKING		
POLICY OBJECTIVES	POLICY OPTIONS	
a. Highlight the value of entrepreneurship to society and address negative cultural biases	 Launch entrepreneurship outreach and awareness campaigns at national, regional and local levels in collaboration with all stakeholders Utilize the media and spaces for policy dialogue, speeches, addresses and reports to communicate support for entrepreneurship Disseminate information about entrepreneurship, including social entrepreneurship, and its impact on the economy Publicly celebrate entrepreneurship role models through awards and other initiatives Involve entrepreneurs in policy dialogue processes to sensitize government officials 	
b. Raise awareness about entrepreneurship opportunities	 Advertise business opportunities linked to national sustainable development strategies, and related incentive schemes Organize information and career fairs, forums and summits on business opportunities, including in specific economic sectors or on specific business models such as micro-franchising 	
c. Stimulate private sector-led initiatives and strengthen networks among entrepreneurs	 Support private sector-led campaigns Facilitate business exchange platforms, business portals, fairs, business associations and clubs Engage diaspora community in local entrepreneurship networks 	

Source: UNCTAD.

An entrepreneurship culture is easier to build on a solid normative foundation. However, where, as in some developing countries, the regulatory environment is relatively weak and reform processes take time to enact, networks often play an important enforcement, communication, counselling, support and trust function for entrepreneurs.

6.2. Policy objectives and policy options

a. Highlight the value of entrepreneurship to society and challenge negative cultural biases

A country's general attitude towards entrepreneurship is a product of societal values, tolerance of risk, fear of failure, rewards of success, encouragement of creativity and experimentation and recognition of persistence. So-called "soft" barriers to entrepreneurship, including negative cultural perceptions, are equally important as the "hard" barriers, and because they tend to be deeply ingrained in a society, they take time to address. However, relatively simple communication tools can successfully challenge many biases against entrepreneurship.

Governments can provide an important signalling function in support of entrepreneurship and can contribute to developing a positive image of entrepreneurs by highlighting the important role that they play in addressing problems that are important to society, such as unemployment, social inequality and poverty and by showing how entrepreneurship, and in particular social entrepreneurship, serves as a key component of national development strategies.

It is important to identify and address cultural biases against entrepreneurship that particularly affect certain sectors of the population. These include any biases against women being actively involved in the economy, or negative perceptions of youth wanting to start a business as opposed to pursuing a more traditional or socially acceptable career path, as well as prejudices against the disabled, racial minorities or indigenous communities.

Effective awareness-generating options include mainstreaming entrepreneurship in policy speeches and addresses by high-level public officials, actively communicating support, and celebrating entrepreneurship initiatives in the private and academic sectors. Celebrating successful *local* entrepreneurs is a particularly effective measure to improve perceptions about existing entrepreneurial barriers and individuals' ability to start a business.

Entrepreneurship outreach and awareness campaigns provide a platform to share information, showcase and celebrate entrepreneurial role models, promote business networks and engage existing and potential entrepreneurs in active dialogue. The aim of an entrepreneurship awareness campaign should be to mobilize the key players in the country's entrepreneurship ecosystem to work together to communicate a unified and powerful message in support of entrepreneurship.

Organizations at the national, regional and local levels should be mobilized to take part in awareness campaigns, including organizations such as entrepreneurs' associations; chambers of commerce, professional associations, employers' federations; trade unions and employees' associations; trade and investment promotion agencies; specialized cooperatives (farmers, artisans, women traders, etc); schools, universities and students associations. Global initiatives that contribute to awareness campaigns such as the Kauffman Foundation's Global Entrepreneurship Congress,¹⁷ and the World Entrepreneurship Forum,¹⁸ have proven particularly effective in entrepreneurship development efforts.

Campaigns can include showcasing entrepreneurship role models, entrepreneurship awards, fairs, talks and business competitions, among others. For example, awards may recognize projects that have made an outstanding business impact, which can be quantified and measured (box 27).

New business ideas and business plan awards can also foster and accelerate the start-up phase for new ventures. Policymakers may also recognize the role that entrepreneurship networks can play in successful policy implementation and evaluation, ensuring the participation of networks of entrepreneurs in policy dialogue, as they can be useful in impact evaluation, providing a critical feedback on the effectiveness of policies.

b. Raise awareness about entrepreneurial opportunities

To promote a culture of entrepreneurship it is necessary to make the entrepreneurship option more tangible by facilitating access to information about business opportunities, including opportunities for

Box 27. Examples of selected policies and initiatives to highlight the value of entrepreneurship to society and to challenge negative cultural biases

Global: *Global Entrepreneurship Week* is a global campaign to raise awareness and promote entrepreneurship initiatives. In 2010, there were more than 1,576 examples of political engagement and six presidents and heads of state publicly expressed their support for Global Entrepreneurship Week and the important role that entrepreneurship has in society. Thousands of activities connected students and policymakers, aspiring and established entrepreneurs, companies and businesses. From business plan competitions to rallies demonstrating the power and potential of entrepreneurship, each event formed part of a global movement.

Chile: The *Start-up Chile* programme has been used as a platform for the Chilean Government, to constantly communicate a positive and supportive image of entrepreneurship. It is executed by the Chilean Economic Development Agency (CORFO) via InnovaChile that seeks to attract early stage, high-potential entrepreneurs to Chile. In 2010, the programme brought 22 start ups from 14 countries, providing them with seed capital and one year visa to develop the business. The initiative makes use of social networking sites such as Twitter and Facebook. It also provides promotional videos on YouTube.

Kenya: Kenya's first international call centre, KenCall succeeded in developing an international presence despite significant administrative, structural and bureaucratic barriers. Even before KenCall became known internationally, the Kenyan government supported and celebrated it in press releases, brought foreign delegations to visit Kenya, and hosted an international outsourcing conference. Government officials used KenCall's experience to push reforms which expedited the construction of East Africa's first undersea optical fibre link.

Colombia: In 2006, the *Law for the Promotion of a Culture of Entrepreneurship (Ley 1014 de 2006, De fomento a la cultura del emprendimiento)* was enacted, which then gave way to the 2009 National Policy for Entrepreneurship, which puts a strong focus on the promotion of entrepreneurial activities, capacity development and awareness. According to article 3 of the law the principles to follow explicitly state the development of sustainable entrepreneurship from a social, cultural, environmental and regional perspective.

Singapore: The *Action Community for Entrepreneurship* (ACE) was launched on 26 May 2003 as a national effort to build Singapore into a creative and entrepreneurial nation. It is a movement that involves both the private and public sectors. ACE works with partners to enhance a pro-enterprise environment; fosters an entrepreneurial culture and mindset; and facilitates learning among entrepreneurs. The programme is led by the Minister-in-charge of Entrepreneurship and Minister of State for Trade and Industry.

Source: UNCTAD Inventory, www.unctad.org/epf

business formalization among people in the informal sector. Government has a role in helping to bridge information asymmetries that may exist about potential business opportunities. Forums that bring actors together and generate awareness of business opportunities in specific sectors can be effective information dissemination and networking tools. Franchising fairs, bringing together retail brands and local entrepreneurs, are a case in point. Governments can also raise awareness about opportunities for local entrepreneurs that may arise from incentive schemes (box 28).

It is important to sensitize rural populations, in particular, about the types of entrepreneurship opportunities that exist at the local level and outside their immediate communities. This can be done through career and information fairs. It is key to bring such platforms of information to the local level, and in partnership with local institutions such as churches, town halls and cooperatives.

c. Stimulate private sector-led initiatives and strengthen networks among entrepreneurs

There are numerous awareness and business development initiatives led by entrepreneurs as a private sector response to governments' call for enterprise-led growth and recovery. Initiatives are spreading in many countries with global companies pledging support to new entrepreneurs through diverse measures ranging from provision of free office space to finance and mentoring support for start-up companies. Google, for example, supports start-ups by providing free on-line advertising. There are also new types of business opportunities for individuals in

Box 28. Examples of selected policies and initiatives to raise awareness of entrepreneurship opportunities

Malaysia: The Prime Minister of Malaysia, in speeches, highlighted opportunities for entrepreneurs in Malaysia's New Economic Model in industries including electrical, electronic, IT, creative industries and biotechnology fields, stating that Malaysia's future in the electrical and electronic sector should be focused not only on manufacturing but also on research and development and design. Among the measures the Government envisaged were incentives for high-value research and support for SMEs supplying larger firms. In resource-based industries, such as palm oil, strengthening research initiatives should lead to indigenous technology that better meets market demand, such as for health fats and oils, biofuel from biomass, cosmetics and biodegradable plastics.

South Africa: The 2011 Agribusiness Projects Summit brought together the investment community as well as farmers and rural entrepreneurs to discuss African investment opportunities in agribusiness as well as opportunities to engage smallholder farmers in the opening up of markets. The annual Summit provides a venue for the business and development community to advance Africa's many agribusiness investment programmes through open networking sessions and dynamic panel discussions led by leading investors, agribusiness project promoters and the African Ministers of Agriculture.

South Africa: Youth Entrepreneurship Campaign 2010 (YEC2010) is a partnership for promoting youth entrepreneurship in South Africa. It is a joint ongoing initiative of Umsobomvu Youth Fund, South African Youth Chamber of Commerce and NAFCOC Youth. The campaign plays an active role in encouraging projects aimed at transferring knowledge, creating awareness of opportunities and available assistance to young people. It also encourages the provision of finance and procurement opportunities for young people to enable the development and sustainability of youth-owned enterprises.

Bangladesh: The purpose of *Bangladesh Social Enterprise Project* (BSEP) is to identify and build innovative partnerships with the private sector to undertake projects which are commercially viable and directly benefit the poor. It organizes training and workshops involving members from the public sector, private sector, development partners and NGOs, for information sharing and developing action plans for business initiatives. Workshops are moderated by experts on the subject.

Costa Rica: The Ministry of Economy, Industry and Commerce, responsible for entrepreneurship, has a *Twitter page* which regularly publishes information about opportunities for entrepreneurs including entrepreneurship fairs and fora, research that is of interest to entrepreneurs such as price comparison studies in different sectors, and training programmes offered to entrepreneurs.

Source: UNCTAD Inventory, www.unctad.org/epf

rural areas to work as micro franchise distributors of products produced by large firms.

Appealing to CSR principles of large, often multinational enterprises may be an effective avenue to engage such firms in local awareness and support campaigns. As these firms also have a self-interest in promoting the development of viable local business partners, they can be involved in networks, fairs for the promotion of specific opportunities, or training sessions.¹⁹

Strong business support networks, including associations, discussion fora, fairs or lobbying organizations, can be valuable for entrepreneurs to start and successfully grow a business. Networks have multiple functions. They help diffuse and communicate information to entrepreneurs about business and export opportunities, programmes and initiatives that support entrepreneurs. Business networks also have an important trust-building function for entrepreneurs,

particularly in the face of weak regulatory environments, as they contribute to providing guarantees and security for contractual engagements. They can also be effective marketing tools for entrepreneurs and provide a client base for businesses.

There are many different types of networks of entrepreneurs. They can focus on linkages between seasoned and new entrepreneurs; they can have a business-to-business dimension; they can link up businesses with the education system; or they can be of a grassroots and informal nature. Often, networks emerge naturally between entrepreneurs in the same business sector or geographical area. Horizontal networks are those that link different small businesses at the same node of the value chain and allow them to share expertise and resources (i.e. a farmers association). Vertical networks, or business linkages, bring together a large-scale enterprise and actual or potential suppliers to create a value chain (box 29).

Box 29. Examples of selected policies and initiatives to stimulate private sector-led initiatives

Global: *Start-up Weekends* are weekend-long, hands-on experiences where entrepreneurs and aspiring entrepreneurs can find out if start-up ideas are viable. An initiative affiliated to the Kauffman Foundation, over 45,000 Start-up Weekend alumni exist and there is a global network of event facilitators. Beginning with idea pitches on Friday, attendees bring their best ideas and inspire others to join their team. Over Saturday and Sunday teams focus on customer development, validating their ideas, practicing lean start-up methodologies and building a minimal viable product. On Sunday evening teams demonstrate their prototypes and receive valuable feedback from a panel of experts.

Global: The Global Reporting Initiative (GRI) is a network-based organization that produces a comprehensive sustainability reporting framework that is widely used around the world. GRI is committed to the framework's continuous improvement and application worldwide. GRI's core goals include the mainstreaming of disclosure on environmental, social and governance performance. GRI's reporting framework is developed through a consensus-seeking, multi-stakeholder process. Participants are drawn from global business, civil society, labour, academic and professional institutions.

Brazil: The Brazilian Service of Support for Micro and Small Enterprises (SEBRAE) has joined forces with the Brazilian Franchising Association (ABF) in order to support the sector. With this collaboration, both institutions seek to boost micro franchising as an alternative for entrepreneurs who want to start or grow their businesses without having to invest large amounts up front. Through the collaboration, the two organizations will distribute orientation material addressed to both franchisees and franchisors. Additionally, SEBRAE has put in place the "Franqueador" programme which offers training and consultancy for entrepreneurs who opt for this type of business model.

Middle East: The Mosaic Foundation and the American Mideast Educational and Training Services (AMIDEAST) work together on an awareness programme to promote entrepreneurship among disadvantaged women of school age from the region and to encourage them to consider starting their own small business after graduation. Moreover, these institutions work with local, regional, and international partners to strengthen and build institutional capacity across the Middle East and North Africa region. These efforts are concentrated in four vital areas: education, legal and judicial reform, public administration, and civil society.

Source: UNCTAD Inventory, www.unctad.org/epf

Horizontal networks are particularly effective in exchanging sector specific information, creating alliances and lobbying for common interests. Associations can also yield practical value for entrepreneurs, in acting as marketing or purchasing organizations, benefiting from collective buying power. Networks can target specific groups such as women or young entrepreneurs or deal with specific areas of interest such as green or sustainable development. Facilitating the development of more diverse networks is important. For example, networks that connect urban and rural entrepreneurs can foster new business opportunities and open new local markets, exports and at the same time contribute to greater national social integration (box 30).

Policymakers should take into account the value of both horizontal and vertical networks and encourage their development. This can be done, for example, through a government portal with information about associations and support networks that serve the interests of entrepreneurs. Platforms of exchange, such as entrepreneurship fairs and business-tobusiness meetings also strengthen existing networks and foster new ones.

Engaging diaspora networks is a powerful tool for knowledge diffusion as well as business counselling. International diaspora networks can also lead to cross-country business opportunities and investment in local firms by foreign entrepreneurs. Diaspora entrepreneurs can leverage their experience abroad to invest in new ventures in their country of origin. Besides financial investment, they can transfer valuable tacit and technical knowledge to local entrepreneurs. By engaging the diaspora community for entrepreneurship development, governments can reverse the "brain drain" and turn it into "brain gain." Many countries have specialized institutions which address the diaspora. Mexico, for example, has an Institute for Mexicans Abroad, which runs within the Ministry of Foreign Affairs.

Box 30. Examples of selected policies and initiatives to develop networks

Colombia: Bavaria Entrepreneurial Social Network (*Red de Emprendedores Bavaria*) is the largest network of entrepreneurs in Latin America with over 25,000 entrepreneurs registered from more than 500 municipalities in the country. It is a virtual space for contacts, business opportunities exchange, distance learning and matchmaking. A team of young professionals operates the network and follows up on initiatives. The network offers relevant information on current entrepreneurship trends at the national and international level and provides entrepreneurs with the opportunity to showcase their products and services.

Taiwan, Province of China: The Science and Technology Advisory Group (STAG) engages in consultations between the Government of Taiwan Province of China and United States-based expatriates and has contributed to reversing the brain drain and strengthening the island's entrepreneurship ecosystem. Biotechnology and pharmaceuticals have been promoted as key industries.

Ethiopia: The *Ethiopian Horticulture Producer and Exporters Association* (EHPEA) was established in 2002 to promote the expansion of the emerging horticulture export sector in Ethiopia by representing the interests of its members and promoting and safeguarding the sustainable competitive position of the sector within the global market. It currently has 85 members and represents over 70 per cent of Ethiopia's producing and exporting horticulture enterprises.

Global: As the interest for sustainable entrepreneurship grows, initiatives such as the *Sustainable Business and Entrepreneurship Platform* have emerged. Developed by UNEP/Wuppertal Institute Collaborating Centre on Sustainable Consumption and Production, this platform brings together different stakeholders concerned about sustainable development so that they can explore new business concepts with long-lasting, positive environmental, social and economic impact.

Global: The *Entrepreneurs' Organization* (EO) is a global business network of 8,000+ business owners in 121 chapters and 40 countries. Founded in 1987 by a group of young entrepreneurs, EO offers a range of resources in the form of events, leadership-development programmes, and an online entrepreneur forum, among others. The organization also operates the Global Student Entrepreneur Awards, an award programme for undergraduate students that own and run businesses while attending a college or university, as well as an Accelerator programme.

Source: UNCTAD Inventory, www.unctad.org/epf

6.3. Promoting Awareness and Networking: A checklist of key questions

- Does the government carry out campaigns to promote entrepreneurship?
- Do policymakers communicate their support for entrepreneurship in speeches, and communicate the link between entrepreneurship and economic development?
- Are measures taken within the public sector to raise awareness of entrepreneurship issues with officials?
- Does the government take part in global entrepreneurship awareness initiatives such as Global Entrepreneurship Week?
- Does the government engage in public-private partnerships to organize entrepreneurship awareness activities such as entrepreneurship fairs or entrepreneurship fora?
- Does the government support competitions, awards or similar events to publicly recognize entrepreneurs?
- Are there initiatives to encourage and recognize corporate social responsibility?
- Do information platforms on entrepreneurship and trade opportunities exist?
- Does the government support networks of entrepreneurs and business leaders?
- Are there measures in place to engage international diaspora networks?

III. PUTTING THE ENTREPRENEURSHIP POLICY FRAMEWORK INTO PRACTICE

Previous sections have examined the six areas of the entrepreneurship policy framework and have cited examples of good practice where policies have been successfully implemented. Policymakers aiming to develop initiatives, measures and institutions to promote and facilitate entrepreneurship and business start-ups can implement the Entrepreneurship Policy Framework following a number of sequential steps.

First, assess the current state of entrepreneurship in the country. This involves evaluating the current business environment in which entrepreneurs start up, operate and grow their businesses, looking at the overall business climate and identifying countryspecific challenges. As part of this step, policymakers should assess the role of entrepreneurship in the country's overall development objectives, particularly with regard to sustainable development. The checklists provided at the end of each section may guide this process, and other tools may be of help. For example, to assess the regulatory environment for business, the World Bank's "Doing Business indicators" can be used.

Second, define the overall entrepreneurship strategy and priorities, both in terms of objectives and targets. Particularly important is defining which groups of entrepreneurs need assistance, and identifying policy and programme gaps and shortcomings of relevance to these groups.

Third, design a focused and coordinated set of measures to address the gaps and shortcomings identified. The examples and cases provided in this document, and the best practice cases included in the web-based inventory that is an integral part of this policy framework, can help by providing policy options that can be adopted and adapted to specific circumstances and goals. The entrepreneurship strategy and priorities, and the concrete measures, should yield action plans for coordinated implementation.

Fourth, monitor and assess the impact of the policy measures and regularly assess feedback from lessons learned. Entrepreneurship policy should be managed dynamically to ensure continued relevance and effectiveness of policies and measures. In the words of one policymaker from a developing country

when he explained his region's success in promoting entrepreneurship and achieving the UN Millennium goals, "The public and private sectors have to be in constant dialogue and that approach is the key to our success". Such a dialogue is most effective when it is led at top level in government, when government officials who participate are properly sensitized about the importance of entrepreneurship and when their performance in achieving the various policy objectives is measured. In order to allow periodic evaluation of policies, it is important to define upfront a number of measurable objectives/targets. Such objectives can be translated into key performance indicators. These performance indicators can be tracked over time to show improvements or deteriorations in the framework conditions for entrepreneurship. This chapter therefore focuses on the last step in implementing the Entrepreneurship Policy Framework, that is, on selecting the indicators that can be used to evaluate the success of the policies and measures put in place under the framework.

The policy objectives and their performance indicators should be limited in number. While multiple indicators might allow a more accurate assessment of the real situation of entrepreneurs, one must bear in mind the resource constraints faced by governments in collecting and analyzing data. Therefore, certain criteria must govern the selection of indicators:

- The indicators must be *relevant and specific* in that they must be linked to the policymakers' objectives and able to measure relevant trends in order to help policymakers adjust policies and programmes.
- The data for constructing the indicators should be readily available or relatively simple to collect, in order not to impose excessive burdens on governments.
- The information should be collected *periodically* and in a timely manner so that the situation of entrepreneurs can be monitored. One-off surveys may produce interesting information about a given point in time but they cannot show the direction of trends. The collection of annual data is also an indication that policymakers are serious about entrepreneurship policy formulation, implementation and measurement.

• Finally, the indicators should be *comparable* across countries to allow benchmarking and to avoid policymakers or implementing agencies "picking and choosing" the most flattering indicators.

Table III provides an illustrative set of possible indicators that comply with the characteristics of relevance, availability, timeliness and comparability. The indicators in table III help to monitor the effect of policy measures in the six areas of the Entrepreneurship Policy Framework. For example, in the area of national entrepreneurship strategy the outcome oriented indicators should show if the measures have resulted in an upsurge in start-ups and an increase in their survival rates. Likewise, have policies allowed more women, youth, minorities and rural populations to start businesses? The indicators to measure changes in the regulatory environment should monitor the level of administrative hurdles faced by entrepreneurs. Indicators for education and skills should show if opportunities for entrepreneurship education are becoming more widely available. In addition they can indicate if the inclusion of entrepreneurship into university research programmes is increasing the commercialization of research. Indicators for *innovation and technology* should tell policymakers if their measures to promote innovative start-ups have succeeded and the role private equity has played in such start-ups. The indicators for *SME and entrepreneurship finance* should measure the willingness and capabilities of banks to support start-ups. Lastly, the indicators on *awareness and networking* should indicate if policymakers are succeeding in fostering a positive societal attitude toward entrepreneurs.

Future work, to be carried out in collaboration with other agencies and international organizations, may include the refinement of these indicators so that a group of core indicators can be identified that will be relevant for most countries or specific groups of countries, at the national level.

Policy Area	Possible indicators	What they monitor
1. Formulating National Entrepreneurship Strategy	 Number of formal business start-ups created annually Survival rates Share of total start-ups in target areas such as high-tech enterprises, green enterprises, social enterprises or enterprises in key exporting sectors Share of total start-ups in target groups such as women, youth, minorities, rural populations Job growth due to start-ups Revenue generated and taxes paid by start-ups (values and growth rates) 	 Success of entrepreneurs in starting and sustaining businesses Success in reaching specific targets for different sectors Improved economic opportunities for target groups of the population Economic impact of entrepreneurship
2. Optimizing the Regulatory Environment	 Number of procedures to open a business, number of agencies involved Number of days, cost to start or close a business Number of days, cost to register a title to property Timeliness of dispute resolution mechanism: number of days from filing to judicial decision 	 Ease of starting/closing a business Effectiveness of the judicial system
3. Enhancing Entrepreneurship Education and Skills Development	 Share of secondary schools offering entrepreneurship programmes/extra-curricular activities Share of technical/vocational schools offering entrepreneurship programmes/ extra-curricular activities Number of annual spin-offs from universities/ research programmes 	 Availability of entrepreneurship education Success of higher education institutions in enterprise-relevant research and in commercializing results of research
4. Facilitating Technology Exchange and Innovation	 Share of graduates with science/ engineering degrees Number (and occupancy rates) of science parks, technology hubs and incubators Share of technology-intensive start-ups in total start ups Share of technology-intensive start-ups with venture capital funding 	 Success in promoting science/ engineering careers Availability and success of facilities for the promotion of technology intensive start-ups Success in promoting technology intensive start-ups
5. Improving Access to Finance	 Share of microfinance/SME loans in total business loans Average value of collateral required for SME loans (per cent of loan) Total VC invested in SMEs Credit bureau coverage (per cent of adult population) 	 Performance of banking sector in facilitating loans to entrepreneurs Support by private investors for start-ups Adequacy of financial infrastructure for entrepreneurship lending
6. Promoting Awareness and Networking	 Results of opinion/attitudinal surveys and evaluations following awareness campaigns Number of business associations devoted to women, youth, rural entrepreneurs, SMEs, 	 Success in fostering a positive societal attitude toward entrepreneurs Opportunities for networking for specific target groups

Source: UNCTAD.

IV. ANNEX: INDEX OF SELECTED POLICIES AND INITIATIVES

1. Formulating National Entrepreneurship Strategy

page

Barbados	The Barbados Entrepreneurship Foundation www.barbadosentrepreneurshipfoundation.org	p. 12
Botswana	Department of Industrial Affairs, Ministry of Trade and Industry www.mti.gov.bw	p. 12
Chile	Division of SMEs, Ministry of Economy www.economia.gob.cl CORFO—The Corporation for the Development of Production www.corfo.cl	p. 12
Costa Rica	National Entrepreneurship Policy (2010–2014), Ministry of Economy, Industry and Commerce www.meic.go.cr	p. 9
Ghana	Private Sector Development Strategy 2010–2015 www.ghana.gov.gh	p.7
Global	Entrepreneurship Indicators Programme (EIP), OECD www.oecd.org	p. 12
Global	Global Entrepreneurship Monitor www.gemconsortium.org	p. 12
Global	Entrepreneurship Snapshots, World Bank Group publications.worldbank.org	p. 12
Latin America & the Caribbean	"Developing Women Entrepreneurs: the necessity to reorient gender policies and programmes in SME development." (2010) Latin American and Caribbean Economic System (SELA) www.sela.org	p. 7
Malaysia	The 10 th Malaysia Plan (2011—2015) www.epu.gov.my	p. 9
Malaysia	Ministry of Works, Malaysia Bumiputera Development Division www.kkr.gov.my	p. 12
Malaysia	Warisan Global www.warisanglobal.com Mason, Cordelia.(2011) "Entrepreneurship Education and Research: Emerging Trends and Concerns" Journal of Global Entrepreneurship. Volume 1, No. 1	p. 12
Mauritius	National Women Entrepreneurship Council, Ministry of Gender Equality, Child Development and Family Welfare www.gov.mu	p. 10
Pakistan	National Youth Policy (2008), Ministry of Youth Affairs www.moya.gov.pk	p. 10
Rwanda	Rwanda Economic Development and Poverty Reduction Strategy (2008–2012), Ministry of Finance and Economic Planning Rwanda Vision 2020, Ministry of Finance and Economic Planning www.minecofin.gov.rw	p. 10
Singapore	Research and Enterprise Division, Ministry of Trade and Industry www.mti.gov.sg	p. 12
South Africa	Entrepreneurial Dialogues www.endeavor.co.za	p. 7

page

South Africa	Youth Entrepreneurship Strategy and Policy Framework, City of Johannesburg http://www.joburg.org.za	p. 9
	The National Youth Development of Agency www.nyda.gov.za	
South Africa	Black Economic Empowerment Policy (2003), Department of Trade and Industry www.thedti.gov.za	p. 10
Zambia	6 th National Development Plan (2011–2015), Ministry of Commerce, Trade and Industry www.mcti.gov.zm	p. 10

2. Optimizing the Regulatory Environment

Albania	Millennium Challenge Corporation Threshold Program www.unctad.org/epf	p. 18
Bangladesh	Bangladesh Better Business Forum www.enterprise-development.org	p. 17
Burkina Faso	Action Plan for Land Registration www.icfafrica.org	p. 18
Central Asia	Supporting Legal and Judicial Reform in Central Asia www.ebrd.com	p. 19
Fiji	Public-Private Dialogue for Investment Climate Reform www.publicprivatedialogue.org	p. 19
Global	World Bank – Foreign Investment Advisory Service www.wbginvestmentclimate.org	p. 17
Global	Lex Mundi Pro Bono Foundation www.lexmundiprobono.org	p. 21
Global	UNCTAD – E-Regulations Tool www.eregulations.org	p. 20
Indonesia	Internal Benchmark for Doing Business www.unctad.org/epf	p. 17
Indonesia	One Stop Shop (OSS) Service Centres for Business Registration and Licensing www.businessenvironment.org	p. 18
Kazakhstan	Atyrau Business Advisory Centre www.unctad.org/epf	p. 21
Kenya	Regulatory Impact Assessment (RIA) www.oecd.org	p. 17
Korea, Republic of	Start-Biz Online World Bank Doing Business Report 2012, www.doingbusiness.org	p. 18
Latvia	Insolvency Law www.balticreports.com	p. 19
Macedonia, Former Yugoslav Republic of	Reducing Administrative Barriers for Business Registration europeandcis.undp.org	p. 18
Mali	Alternative Dispute Resolution Project www.icfafrica.org	p. 19
Viet Nam	Internal Benchmark for Doing Business www.unctad.org/epf	p. 17
Viet Nam	Online Business Registration, Ho Chi Minh City, Department of Planning and Investment www.dpi.hochiminhcity.gov.vn	p. 21
Zambia	Electronic Case Management System World Bank Doing Business Report 2011, www.doingbusiness.org	p. 19

3. Enhanci	ng Entrepreneurship Education and Skills Development	page
Argentina	Young Rural Entrepreneurs Project http://www.minagri.gob.ar	p. 26
Asia	Consulting Based Learning For ASEAN SMEs (COBLAS) www.unctad.org/epf	p. 26
Brazil	Online Virtual Business Game (SEBRAE Challenge) www.desafio.sebrae.com.br	p. 23
Brazil	Entrepreneurial Pedagogy Methodology (EPM) www.starta.com.br	p. 26
Brazil	1 st National Award for Entrepreneurship Educators www.educacaoempreendedora.org.br	p. 27
China, People's Republic	China-UK Entrepreneurship Educators Network eechinauk.com	p. 27
China, People's Republic	The Bright China Foundation www.bcf.org.cn	p. 28
Global	Junior Achievement www.ja.org	p. 23
Global	Disney's Hot Shot Business Online Game disney.go.com	p. 23
Global	Students in Free Enterprise (SIFE) www.sife.org	p. 23
Global	UNCTAD EMPRETEC – Entrepreneurship Training Programme www.empretec.net	p. 25
Global	Aflatoun www.aflatoun.org	p. 26
Global	UNIDO – Entrepreneurship Curriculum Programme (ECP) www.unido.org	p. 26
Global	ILO – Know About Business (KAB) Programme www.ilo.org	p. 27
Global	Intel and UC Berkeley Technology Entrepreneurship Challenge www.entrepreneurshipchallenge.org	p. 28
Global	TechnoServe Business Solutions to Poverty www.technoserve.org	p. 28
Global	FastTrac fasttrac.org	p. 28
Global	Goldman Sachs 10,000 Women Initiative www.10000women.org	p. 28
Global	E-Mentoring Platform (ETH Zurich, UNCTAD, African Technology Development Forum) match.atdforum.org	p. 28
India	National Institute for Small Industries Extension Training (NISIET) www.unctad.org/epf	p. 23
Indonesia	National Entrepreneurship Teaching Conference www.ciputra.org	p. 27
Kenya	Entrepreneurship Education www.unctad.org/epf	p. 23
Mexico	Monterrey Institute of Technology's Entrepreneurship Programme www.itesm.edu	p. 27

Middle East & North Africa	INJAZ Education Programme www.injaz.org.jo in Jordan and www.injaz-saudi.org in Saudi Arabia	p. 23
Panama	Mentorship initiative – Vital Voices / Empretec www.vocesvitalespanama.org	p. 28
Peru	Peruvian Institute for Entrepreneurial Action (Instituto Peruano de Acción Empresarial) www.ipae.pe	p. 27
Philippines	Philippine Center for Entrepreneurship (PCE) www.unctad.org/epf	p. 28
Singapore	Singapore Management University www.smu.edu.sg	p. 26

4. Facilitating Technology Exchange and Innovation

page

Brazil	Innovation Law of 2004 (Lei da innovacao), Ministry of Science, Technology and Innovation www.mct.gov.br	p. 34
China, People's Republic	Home Appliances Going to the Countryside, Ministry of Commerce and Ministry of Finance UNCTAD Information Economy Report 2010: www.unctad.org	p. 31
East Africa	"m:labs" Incubators www.mlab.co.ke	p. 35
Egypt	Strategy to support SMEs in the field of ICT, Ministry of Communications and Information Technology www.mcit.gov.eg UNCTAD ICT Policy Review Egypt: www.unctad.org	p. 35
Global	UNCTAD – Business Linkages Programme www.unctad.org	p. 33
India	Honey Bee Network & Grassroots Innovation Augmentation Network www.sristi.org and www.gian.org	p. 34
Korea, Republic of	Industry-University-Research Consortium Programme www.unctad.org/epf	p. 34
Morocco	The Casablanca Technopark Incubation Centre www.unctad.org/epf	p. 35
Panama	Entrepreneurship Network Opportunities for Poor Families www.unctad.org/epf	p. 31
Panama	The City of Knowledge www.ciudaddelsaber.org	p. 35
Poland	The Innovation Voucher Programme, Polish Agency for Enterprise Development (PARP) www.parp.gov.pl	p. 34
Singapore	Technology Enterprise Commercialisation Scheme, SPRING Singapore www.spring.gov.sg	p. 34
Uganda	CELAC (Collecting and Exchanging Local Agricultural Content) www.celac.or.ug	p. 31
Zambia	Technology Development and Advisory Unit, University of Zambia www.unza.zm	p. 34

5. Improving Access to Finance

	Access to Finance	page
Africa	GroFin www.grofin.com; www.unepfi.org	p. 39
Chile	FOGAPE (Fondo de Garantía para Pequeños Empresarios) www.fogape.cl	p. 38
China, People's Republic	Intellectual property (IP)-based finance programme english.sipo.gov.cn	p. 39
Egypt	Iscore IFC 2010: "Scaling-Up SME Access to Financial Services in the Developing World", www.ifc.org	p. 42
Ghana	Mutual EMPRETEC Guarantee Association www.unctad.org/epf	p. 3
Global	Harvard Entrepreneurial Finance Lab www.efinlab.com	p. 3
Global	E+Co Venture Capital Fund www.eandco.net	p. 3
Global	World Business Angels Association www.wbaa.biz	p. 3
Global	Post Office Banking New Economics Foundation 2010: "The Case for a Post Bank" www.unctad.org/epf	p. 4
Global	Accounting for entrepreneurs and micro-enterprises www.unctad.org/isar	p. 4
Global	Finance Alliance for Sustainable Trade (FAST) www.fastinternational.org	p. 4
ndia	Financial Literacy and Credit Counselling Centres, Reserve Bank of India www.rbi.org	p. 4
Kenya	Business Partners International (BPI) SME Fund IFC 2010: "Scaling-Up SME Access to Financial Services in the Developing World", www.ifc.org	p. 3
Kenya	Equity Bank Mobile Branches www.equitybank.co.ke	p. 4
Korea, Republic of	Korean Technology Rating System isl.yonsei.ac.kr	p. 3
Malaysia	"Pioneer Status" to Entrepreneurs www.unctad.org/epf	p. 3
Mexico	NAFIN (Nacional Financiera) www.nafin.com	p. 3
Nigeria	Enterprise Development Centre (EDC) edc.edu.ng	p. 4
Peru	Caja Municipal Sullana www.cmac-sullana.com.pe	p. 4
South Africa	National Financial Charter UNCTAD 2009: "Enhancing the Role of Domestic Financial Resources in Africa's Development: A Policy Handbook", www.unctad.org	p. 4
South Africa	National Credit Regulator (NCR) www.ncr.org.za	p. 4

page

6. Promoting Awareness and Networking

Bangladesh	Bangladesh Social Enterprise Project (BSEP) www.socialenterpriseportal.org	p. 47
Brazil	SEBRAE-ABF Micro-franchising initiative www.sebrae.com.br	p. 48
Chile	Start-up Chile www.startupchile.org	p. 46
Colombia	Law for the Promotion of a Culture of Entrepreneurship www.secretariasenado.gov.co	p. 46
Colombia	Bavaria Entrepreneurial Social Network (Red de Emprendedores Bavaria) www.redemprendedoresbavaria.net	p. 49
Costa Rica	Ministry of Economy, Industry and Commerce: Twitter page twitter.com/meic_crc	p. 47
Ethiopia	Ethiopian Horticulture Producer and Exporters Association www.unctad.org/epf	p. 49
Global	Global Entrepreneurship Week www.unleashingideas.org	p. 46
Global	Startup Weekend www.startupweekend.org	p. 48
Global	Global Reporting Initiative (GRI) www.globalreporting.org	p. 48
Global	Sustainable Business and Entrepreneurship Platform www.sustain-entrepreneurship.org	p. 49
Global	Entrepreneurs' Organization Network www.eonetwork.org	p. 49
Kenya	KenCall www.kencall.com	p. 46
Malaysia	New Economic Model www.pmo.gov.my	p. 47
Middle East	AMIDEAST www.amideast.org	p. 48
Singapore	Action Community for Entrepreneurship (ACE) www.ace.sg	p. 46
South Africa	2011 Agribusiness Projects Summit www.unctad.org/epf	p. 47
South Africa	Youth Entrepreneurship Campaign 2010 www.unctad.org/epf	p. 47
Taiwan, Province of China	Science and Technology Advisory Group (STAG) www.gio.gov.tw	p. 49

NOTES

- ¹ Lin, Justin Y., C. Monga (2011) "Growth Identification and Facilitation: The Role of the State in the Dynamics of Structural Change", World Bank Working Paper No. 5313; Radosevic, S. (2010) "What makes entrepreneurship systemic?", in Malerba, F. (2010) *Knowledge-Intensive Entrepreneurship and Innovation Systems*, Routledge, UK.
- ² The Report of the United Nations Secretary General's High Level Panel on Global Sustainability (2012).
- ³ Kelley, D., N. Bosma and J.E. Amorós and Global Entrepreneurship Research Association (2011) *Global Entrepreneurship Monitor 2010*, Global Report available at www.gemconsortium.org.
- ⁴ Altenburg, T. (2011) "Industrial Policies in Developing Countries: Overview and lessons from seven country cases", Discussion Paper 4/2011, German Development Institute, Bonn..
- ⁵ For alternative approaches see, e.g.: OECD (2008) *Measuring Entrepreneurship : A digest of indicators*, OECD-Eurostat Entrepreneurship Indicators Programme.
- ⁶ www.heritage.org/index; www.doingbusiness.org; info.worldbank.org/governance; www.weforum.org/issues/global-competitiveness; www.bertelsmann-transformation-index.de/en/bti; www.gemconsortium.org; www.enterprise-development.org/page/measuring-and-reporting-results.
- ⁷ www.doingbusiness.org.
- ⁸ See, for example, World Bank (1994), Governance: the World Bank experience.
- ⁹ UNCTAD (2010) Creating Business Linkages: A Policy Perspective, available at: www.unctad.org; UNCTAD (forthcoming) Design and Use of Incentives to Promote Business Linkages.
- ¹⁰ For UNCTAD's work in this field, see the work of the Division on Technology and Logistics at www.unctad.org.
- ¹¹ UNCTAD (forthcoming) Corporate Social Responsibility in Global Value Chains.
- ¹² IFC / McKinsey (2010) Two trillion and counting: Assessing the credit gap for micro, small, and medium-size enterprises in the developing world.
- ¹³ International Finance Corporation (2010) Scaling-up SME Access to Financial Services in the Developing World.
- ¹⁴ OECD (2009) The Impact of the Global Crisis on SME and Entrepreneurship Financing and Policy Responses.
- ¹⁵ www.bis.org.
- ¹⁶ See studies by European Association of Mutual Guarantee Societies, www.aecm.be.
- ¹⁷ www.kauffman.org.
- ¹⁸ www.world-entrepreneurship-forum.com.
- ¹⁹ See also, the UN Global Compact initiative, www.unglobalcompact.org.

