Issues Paper 1: Innovative SMEs and Entrepreneurship for Job Creation and Growth
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OECD WPSMEE “BOLOGNA +10” HIGH-LEVEL MEETING ON
“SMEs and Entrepreneurship: Lessons from the Global Crisis and the Way Forward to Job Creation and Growth”

SESSION 1
Innovative SMEs and Entrepreneurship for Job Creation and Growth

ISSUES PAPER

Background and introduction

1. New firms and innovative SMEs are playing an increasing role as drivers of growth and job creation in the economy, but they face major challenges in responding to globalisation and the shift to new forms of innovation. Firm creation and SMEs have also been strongly adversely affected by the global financial and economic crisis of 2008-9, which has been associated with substantial closures and rationalisations, but at the same hold the prospect of driving a return to pre-crisis employment and output levels in the recovery period. To fulfil their potential for job creation and long-run growth, governments must ensure a business environment that stimulates entrepreneurship and does not impose undue burdens on innovative SMEs and an appropriate set of structural policies addressing market, system and government failures in areas including financing, access to markets and knowledge networks, the management of intellectual assets and entrepreneurial human capital. Governments must both address problems that have been exacerbated by the crisis and put into place a policy framework that is more conducive to innovation-led growth in the future.

2. The importance of innovative SMEs and entrepreneurship has been recognised from the beginning of the OECD Bologna Process on Entrepreneurship and SME policies. In June 2000, the Bologna Charter on SME Policies adopted by 48 OECD member and non-member economies recommended improvements to SMEs’ abilities to manage innovation, reduction of financial barriers to SME innovation and facilitation of SMEs’ access to national and global innovation networks. This was underlined by the OECD Istanbul Ministerial Declaration on Fostering the Growth of Innovative and Internationally Competitive SMEs in June 2004, in which Ministers committed to working co-operatively to achieve progress in reducing barriers to SMEs’ access to international markets and assessing the effects of globalisation on SMEs, in particular examining issues related to SME access to financing and to support for innovation.

3. Building on the analytical and information-sharing activities of the OECD Working Party on SMEs and Entrepreneurship in this area and a wide range of other sources, this “Bologna +10” High-level Meeting investigates and seeks agreement on the policies required to harness the potential of entrepreneurship and innovative SMEs in the aftermath of the global financial and economic crisis. The debate centres around the following questions:

- What barriers (market, system, government and behavioural problems) should policy address in the generation of start-up companies and the achievement of healthy entrepreneurial dynamics?
How should policy address the barriers to the growth of innovative SMEs?

What are the most effective and efficient policies in these areas? How can value for money be increased given the tight fiscal climates in many countries?

I. The impact of innovative SMEs and entrepreneurship on job creation and growth

4. A number of key facts have been established that characterise the contribution of innovative SMEs and entrepreneurship to job creation and growth:

- SMEs represent the majority of all businesses and employment. Across the OECD area, they account for approximately 99 per cent of all enterprises and two-thirds of employment. Figure 1 presents the statistics for the manufacturing sector. Their weight in employment terms implies that governments must take account of the impacts of their policies on SMEs.

- New firms play an important role in job creation. Between 1 and 6 per cent of employment was generated by new firm creations across a range of countries (see Figure 2). Nearly all net job creation in the US from 1977-2005 occurred in firms less than 5 years old (Annex Figure A.1). Once started, the majority of new firms will remain in the SME sector and appropriate SME policies and framework conditions are also required to maintain the positive effect on employment.

- High-growth enterprises play a disproportionate role in job creation. The 10 per cent most rapidly growing enterprises created between 50 and 60 per cent of gross employment gains over a 5-10 year period in France, Italy, the Netherlands and Greece, while in Spain this was nearly 90 per cent (OECD, 2002). Nearly 50 per cent of these high-growth firms started as SMEs. Although the probability of rapid growth declines with the age of firms, the great majority are existing SMEs that were more than five years old. There are nevertheless notable differences among countries in the share of high-growth enterprises (Figure A.2).

- The two major distinguishing characteristics of high-growth SMEs are their export orientation and their innovation capabilities, including their effective exploitation of intellectual assets, active networks and adequate finance (OECD, 2002, 2010a).

- SMEs lost fewer jobs than large firms in past recessions, cushioning the impact of reduced output on unemployment levels. In the current crisis, employment in SMEs continued to hold up better than employment in larger enterprises in several countries. But evidence from the US Bureau of Labor Statistics suggests that the pattern of job creation and destruction may have changed in the latest recession, at least in the USA.

- In the longer term new firms, high-growth SMEs and SMEs can help raise productivity and introduce innovations, although SMEs may also be a drag on productivity if they are not able to improve performance. Enterprise churn, i.e. firm exits and their replacement by firm entries, is estimated to have accounted for between 20 and 40 per cent of labour productivity growth in a range of European countries and the USA (OECD, 2003).

- A select group of innovative SMEs are initiators of breakthrough innovation. They are often but not always high-growth SMEs. New firms represent a significant proportion of all patents filed by businesses, but this share varies strongly by country (see Annex Figure A.3).
• The contribution of the SME sector to national R&D is also highly uneven, and is often greater in small economies than in large ones.

• Globalisation appears to be impacting on entrepreneurship. For example, increases in market access have been associated with increases in the stock of SMEs (OECD, 2010c).

Figure 1. Distribution of employment in the manufacturing sector
By firm size, 2007

[Bar chart showing distribution of employment by firm size, 2007]

Source: OECD Structural Business Statistics Database.
Notes: Employment is defined as “number of employees”. 1. Total employment (persons engaged). 2. Data for 2006.

Figure 2. Employment creation by enterprise births, 2005 and 2006
As a percentage of the total number of persons employed in manufacturing and services

[Bar chart showing employment creation by enterprise births, 2005 and 2006]

Notes: 1. Mining and quarrying; manufacturing electricity, gas and water.
2. Wholesale and retail trade; hotels and restaurants; transport, storage and communications; financial intermediation; real estate, renting and business activities.

Source: OECD Entrepreneurship Indicators Project (2009)
II. Barriers to innovative SMEs and entrepreneurship

5. A number of barriers may constrain entrepreneurship and the creation and rapid growth of innovative SMEs, and hence impede the ability of economies to achieve full employment and economic growth. Delegates will have the opportunity to discuss the nature of the most important barriers and their implications for public policies. They include inappropriate framework conditions for entrepreneurship, barriers to SME access to international markets and knowledge flows, weak intellectual asset management by SMEs and lack of entrepreneurial human capital.

Poorly adapted framework conditions

6. The importance of framework conditions in affecting the entry, growth and exit of enterprises has been recognised by Ministers and representatives of governments in the Bologna Charter on SME Policies and the Istanbul Ministerial Declaration on Fostering the Growth of Innovative and Internationally Competitive SMEs. Lack of macroeconomic stability, such as volatile interest rates and exchange rates, reduce investment by SMEs and entrepreneurs. Regulatory environments often impose undue burdens on SMEs and entrepreneurship such as through high and regressive compliance costs, lack of transparency in the application of rules and legislation, inefficient bankruptcy laws and procedures, lack of clarity and coherence in product standards in world markets, unfair or non-transparent competition policy and ineffective anti-corruption measures. Policy makers may wish to consider in particular the importance of the tax and social security regime, which may inadvertently discriminate against SMEs and entrepreneurs relative to large existing firms in both effective tax rates and compliance burdens (OECD, 2009, 2010d). Innovative SMEs and entrepreneurs also commonly suffer from lack of access to financial services, particularly to seed and development capital, which has been exacerbated by the financial and economic crisis. This issue is the subject of Session 2 of the meeting.

Obstacles to accessing international markets and knowledge flows

7. New firm start-ups and innovative SMEs increasingly operate in international markets, exposing them to foreign competition and providing them with new opportunities. At the same time, globalisation is increasing the importance of cross-border knowledge flows about markets, suppliers and technologies, which help to upgrade SME competitiveness and stimulate SME growth. Access to knowledge flows is particularly important in the context of the widespread adoption of open innovation methods in many sectors, involving collaborations between new and small firms and other firms and organisations in developing new products and services, new process technologies and new organisational models. Foreign partners can be particularly valuable in such knowledge exchange networks. Indeed, export orientation and active innovation networks are the core characteristics associated with rapid SME growth.

8. However, SMEs are under-represented in the international economy. While they typically contribute around 50% to GDP in national economies, they account for only about 30% of exports, and even less of international direct investment. They are also less likely than large firms to engage in formal collaboration for innovation (Figure A.3). To some extent, this under-representation is mitigated by the participation of some new firms and SMEs in global value chains, which enables these firms to export and collaborate indirectly as well as directly by supplying other, often larger, firms in their domestic markets.
There are many barriers affecting the internationalisation of SMEs and entrepreneurs. Many are internal to the SME: limited information on foreign markets and supply chain and technology partners, lack of managerial time for international engagement, lack of workforce skills and knowledge to access markets and collaborators and absorb innovation, shortage of working and investment capital to finance exports and deal with slow supply chain payment schedules and lack of sufficient product and service quality to meet customer requirements. Non-tariff barriers and poorly adapted framework conditions are further problems for SMEs, notably administrative and technical difficulties, exchange rate fluctuations, documentation and payment problems.

Weak intellectual assets management by SMEs

The management of intellectual and intangible assets is critical for turning innovation into a driver for SME competitiveness and growth, particularly for new enterprises and SMEs that rely strongly on the exploitation of intellectual capital in their business models, such as university spin-off companies and firms in creative industries like design and media. The use of intellectual property rights (IPR) including patents, copyrights and trademarks can be an important tool for protecting and managing intellectual assets, assisting SMEs to open up new markets, increase enterprise value and raise finance, although some firms prefer informal methods such as secrecy and short lead times. However, studies show that SMEs rarely have explicit intellectual assets strategies, lack knowledge of the possibilities offered by IPR regimes and use intellectual property protection to a much smaller extent than large firms (OECD, 2010, forthcoming).

A key challenge relates to the internal management practices of SMEs. SMEs are often too driven by short-term thinking based on securing immediate commercial advantage to be concerned with the strategic use of their intellectual assets. This is demonstrated by lack of knowledge, an absence of preparedness, short term allocations of resources and a reluctance or inability to develop a ‘portfolio’ approach to intellectual property. It is often coupled with a considerable lack of knowledge about available strategies for formal and informal intellectual property protection. In particular, the role of copyrights and trademarks in protecting intellectual assets are poorly understood by SMEs.

Further problems relate to the lack of adaptation of current regulatory landscapes to SME operating practices and resources. Indeed, some SMEs may be rational in not applying for patents when they weigh up the expected costs and benefits. On the one hand, the costs of patent litigation can be very high for small firms and may not be successful, while on the other hand the costs of taking out patents are high. For example, a European patent is estimated to cost over 30,000 Euros over 20 years in patent fees alone. A key issue is therefore the high fixed costs of using IPRs, which concerns not only fees but also the costs of enforcement and litigation and complexities associated with filing and prosecution. The need for multiple filings for cross-border commerce and differences in regulatory regimes in different countries also makes it difficult for small firms to protect innovations across borders. SMEs have further difficulties in managing the large (and increasing) amount of IP related information flows. This lack of expertise often leads to an ad hoc approach on IP issues.
Lack of entrepreneurial human capital

13. Entrepreneurship skills are necessary for organising, leveraging and managing resources for the creation of a new venture. A portfolio of entrepreneurship skills is required including risk assessment, strategic thinking, self-confidence, networking, motivational and other skills. Start-up entrepreneurs often lack skills across a number of the relevant areas. Rather than in the area of small business management skills, such as business planning and accounting, the major gap appears to be in the area of strategic skills associated with entrepreneurship, including decision-making, risk-taking, information processing, opportunity recognition, resource organisation, market awareness and product management. Entrepreneurship education and training programmes in schools, colleges, universities and other organisations seek to address this gap. However, there are significant inequalities across countries in the exposure of individuals to entrepreneurship training (Figure A.4). Furthermore, there are a number of common weaknesses in entrepreneurship training provision. For example, training is often limited to certain subject disciplines such as business studies rather than reaching all students although there is evidence that graduates from other disciplines often have a greater propensity to start enterprises than business studies graduates. In addition, traditional classroom teaching and assessment methods are often used rather than more practical and interactive methods, while there is commonly a lack of training and support for entrepreneurship teachers.

Insufficient exploitation of public research and procurement opportunities

14. Public research generates enormous knowledge that is potentially exploitable through new firm creation and knowledge transfer to SMEs. This potential is not fully exploited. In part this is because some SMEs are not able or do not know how to communicate and co-operate with universities and research laboratories, while research organisations often lack adequate incentives and structures for engagement with SMEs. Governments have put a range of measures in place to address these problems, such as financial support for spin-offs and SME involvement in collaborative research projects, creation of science parks, business incubators and technology centres, strengthening of clusters and local innovation systems, and innovation brokers and research-industry labour mobility schemes. Participants may wish to consider whether current approaches to knowledge transfer and research commercialisation are fulfilling their role and whether there is room for new solutions.

15. National and local governments are important purchasers of products and services, which often involve requirements for innovation on the part of suppliers. However, new and small firms often find it difficult to access contracts because of complexity in rules, lack of information on opportunities and conditions placed on the track records and financial standing of the enterprises that can be engaged. As a consequence there appears to be under-exploited potential to use government procurement to drive forward entrepreneurship and innovation while maintaining security and value for money.
III. What can governments do?

16. To promote job creation, innovation and economic growth, policies should focus on tackling market, system and government failures holding back new firm formation, healthy enterprise demographics (a dynamic package of firm entry, growth, decline, and exit reinforcing net change and adjustment) and high-growth SMEs. Priorities include actions to create a conducive entrepreneurial business environment, facilitate the internationalisation of SMEs and entrepreneurship, improve SME intellectual asset management, enhance entrepreneurship skills and increase the exploitation of public research and procurement opportunities.

17. Governments are seeking to identify and assess policies that are relevant, effective and efficient in these areas. For this purpose, the analytical and empirical basis for informed policy design needs to be improved, co-ordination between governments and regional and international organisations and institutions encouraged, and benchmarking and exchange of best practices supported. The assessment and peer review methods of the OECD Working Party on SMEs and Entrepreneurship are ideally suited for this exchange. They could be reinforced through the establishment of an agreed programme of country-level peer reviews in this area.

<table>
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<th>Policies and Programmes</th>
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<tr>
<td>Create a conducive entrepreneurial business environment</td>
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<tr>
<td>• Ensure stable macroeconomic and framework conditions. Stable and predictable regulations, institutions and policies are important to enabling healthy SME and entrepreneurship activity.</td>
</tr>
<tr>
<td>• Streamline and simplify administration and regulations affecting new firm creation and SMEs. Take account of the impact of regulations and administration on SMEs and new firm creation. Establish one-stop shops for regulatory information and transactions and introduce ‘sunset’ legislation to minimize the burden on small businesses of legal requirements designed for past circumstances.</td>
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<tr>
<td>• Reduce tax and social security compliance burdens and secure fair tax and social security treatment for new firms and SMEs. Ensure that effective tax rates do not distort the market by discriminating unfairly against new firms and SMEs. Introduce simplified compliance mechanisms for SMEs and new firms.</td>
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<tr>
<th>Facilitate SME internationalisation</th>
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<tr>
<td>• Increase the participation of SMEs in international collaborative research programmes. Promote greater SME involvement in publicly-supported collaborative research partnerships that connect science to innovation, such as by simplifying application procedures, disseminating information on opportunities and encouraging funding of partnerships including SMEs.</td>
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<tr>
<td>• Address financial barriers to internationalisation. Identify cost-effective ways to strengthen financial markets for SMEs seeking to export and participate in global value chains, for example by providing export credit guarantees to private finance providers and increasing the investment readiness of SMEs.</td>
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Proposed Recommendations
- **Segment existing support on the basis of the type of SME addressed.** Increase the effectiveness and efficiency of existing SME innovation policies by increasing the targeting of approaches to those categories of SMEs that are experiencing particular types of market failures and have been shown to benefit, whilst limiting deadweight, for example by distinguishing between firms that are new to international activity, those that are more experienced but stable international SMEs, and those that are seeking to grow their international businesses from a good base.

- **Support SME participation in global value chains.** Identify cost-effective ways of facilitating SME participation in global value chains for innovation and export promotion, for example by overcoming information and coordination barriers to collective action among SMEs and facilitating linkages between foreign direct investment ventures and local suppliers for SME upgrading.

- **Tackle the problem of identifying foreign market and collaboration opportunities.** Provide brokerage and information to assist SMEs to locate and analyse opportunities and contact potential overseas customers and partners.

**Improve SME intellectual asset management**

- **Enhance SME awareness of the possibilities to protect their intellectual assets.** Increase awareness of the range of property protection including patents, trademarks, industrial designs, utility models, trade secrets, copyright and related rights, plant varieties and non-original databases. Train SME managers on the value and mechanisms of intellectual asset management.

- **Facilitate appropriate advice and consultancy on intellectual asset management to SMEs and new firms.** Support the development of a market for professional services for intellectual assets management and intellectual property use.

- **Adapt the intellectual property rights system to the needs of SMEs and entrepreneurs.** Introduce differentiated systems that distinguish between SMEs and larger firms, reflecting the different capacities to defray fixed costs against expected benefits. Address filing issues, for example by an application system which is accessible at the local level and creating a fast-track filing system for SMEs. Address enforcement issues by establishing specialist intellectual property courts and judges and instituting careful use of mandatory arbitration and alternative dispute resolution. Address cross-border issues by adopting common patent models, standardising rules and providing support services for protection in foreign markets.

**Enhance entrepreneurship skills**

- **Smartly scale up entrepreneurship education in higher, vocational and school education.** Increase the number of participating institutions and Schools where there is evidence of success. Shift the emphasis from business management skills to strategic skills for growth-oriented entrepreneurship. Introduce interactive teaching methods that incorporate practical experience.

- **Embed teaching of an entrepreneurship mindset in school curricula.** Accompany this with relevant teacher training and teaching materials designed for entrepreneurship.

**Increase the exploitation of opportunities from public research and procurement for SMEs and entrepreneurship**

- **Facilitate academic spin-offs.** Offer seed funding, pre-competitive research and proof-of-concept support and advice and training for enterprise creation by academics.

- **Stimulate collaboration activities involving universities and research organisations and SMEs and entrepreneurs.** Strengthen knowledge transfer infrastructures such business incubators and science parks, collaborative research programmes, technology-bridging institutions and university-industry labour mobility. Promote the development of clusters and connections within local innovation systems. Increase the innovation absorption capacities of SMEs and the motivations of research organisations to engage in knowledge transfer to enterprise.
• **Use public procurement to accelerate the demand for innovation from new and small firms.** The innovation readiness of SMEs and entrepreneurs and their ability to bring forward new innovation can be increased by well-targeted public procurement programmes, in particular pre-commercial procurement.

*Strengthen mechanisms for international review and information exchange on SME and entrepreneurship policies*

• **Strengthen the evaluation of SME and entrepreneurship policies.** Use robust methodologies for impact assessment capable of estimating the counterfactual together with methods that can throw light on the processes through which policy works and the quality of programme management.

• **Encourage exchange of experiences at international level regarding policy successes, failures and best practices.** Develop a regular programme of peer review assessments of national government policies.

*Further Work by the OECD*

• Assess the policy requirements to ensure that new and young firms can take advantage of technological and commercial opportunities to develop, grow and create jobs. This should take into account, in particular, the evolving global competitive scenario and the rapidly increasing role of emerging countries for international trade, value creation and global growth.

• Develop further the program of peer review of SME and Entrepreneurship Issues and Policies at national and local levels to assist governments in policy design, implementation and evaluation to enhance SMEs’ and entrepreneurs’ performance.

• Address the knowledge gap that exists on (a) what are the crucial entrepreneurship skills, (b) what constitutes good practice in effective entrepreneurship skills policies, including for women’s entrepreneurship, and (c) what roles should be played by governments at the national and local level, and d) how coordination across levels could be improved. This also demand developing indicators that measure changes in entrepreneurship skills and support evaluation of policies in a fast changing environment.
REFERENCES


OECD (2010b) Moving Beyond the Jobs Crisis, OECD, Paris.


ANNEX 1

CHARTS

Figure A.1 US Net Job Growth at Startups versus Existing Firms, 1977-2005


Figure A.2 Share of high-growth enterprises (employment definition), 2006
As a percentage of all enterprises with 10 or more employees (figures above the bar indicate change from previous year)

Notes: 1. Mining and quarrying; manufacturing electricity, gas and water.
2. Wholesale and retail trade; hotels and restaurants; transport, storage and communications; financial intermediation; real estate, renting and business activities.
3. Employer enterprises with fewer than 250 employees.

Source: OECD Entrepreneurship Indicators Project (2009)
Figure A.3  Patent applications filed by young firms, 2005
As a percentage of patents filed by firms at the European Patent Office (EPO)

Source: OECD, HAN database, October 2009 and Bureau Van Dijk Electronic Publishing, August 2008

Figure A.4  Firms collaborating in innovation activities, by size, 2002-2004 (as % of all firms)


Figure A.5.  Population aged 18-64 with training in starting a business, 2008
As a percentage of total population