I. Introduction and Context

Country Context

Following Montenegro’s decision to adopt the euro as its only legal tender, growth can neither be stimulated by exchange-rate or monetary policies nor by credit-financed aggregate-demand stimuli akin to those fueling the post-independence boom. In the future, growth will have to come from within, driven by entrepreneurship, innovation and increasing productivity. The twin objectives of increasing potential growth and increasing international competitiveness place higher education, research and innovation at the center of the policy agenda.

Moving closer to EU accession, Montenegro will need to significantly increase its competitiveness and review its policies with regard to employment, skills development and technological innovation and absorption. The education sector of Montenegro consists of: 162 primary schools to which are attached 280 satellite units, teaching approximately 75,000 children; 48 secondary schools of which 37 are secondary vocational schools, teaching 31,000 students (70 percent of students are in vocational schools, and 35 percent of these are in 3-year programs). The higher education sector consists of 1 public and 2 private accredited universities and 5 other non-university private institutions, enrolling about 25,000 students, 21,000 of whom are studying in the public University of Montenegro. The sub-units (#faculties# or departments) of the University of Montenegro also include research institutes, but human research capacity is limited.

Sectoral and Institutional Context

While gross tertiary education enrollments are relatively high, at 52%, the higher education system faces funding and institutional constraints, and reforms are needed to align with EU practices. Montenegro’s higher education system suffers from structural issues resulting in comparatively high drop-out and deficiencies in quality and management. The funding model needs a significant overhaul to reward quality teaching and research. There are no financial incentives in place to support conducting research or focusing on quality, efficiency, and relevance in teaching.

Moreover, the institutional structure needs to be upgraded, especially to build capacity in the Ministry of Education and Sport and to improve management of the University of Montenegro. Academic infrastructure of the public university must be modernized and instruction standards upgraded in line with the Bologna agreements, while for the private institutions, regulatory frameworks which enable transparency and confidence in their quality in order the promote healthy competition with the public university ought to be encouraged, as is the case in with the strategy for higher education.

The data available indicate that expenditures on R&D in Montenegro amount to less than 0.16 percent of GDP, which would significantly trail the EU25 average of 1.86 percent and falls far short of the 3% target of the Lisbon Agenda/Europe 2020 Strategy. Some other factors inhibiting innovation and R&D in Montenegro include: a fragmented innovation policy framework focused too much on basic, isolated R&D; poor linkages between higher education institutions, R&D centers, and private businesses at national and regional levels; the insufficient availability of scientists and engineers; limited patenting and technology commercialization activities; and high-technology exports as a small share of total exports. The Government has already approved a two-pronged strategy for strengthening capacity for innovation and R&D which proposes to: (i) participate in a regional initiative to enable economies of scale and increased productivity of local research through enhanced cooperation and specialization at country level; (ii) invest domestically to strengthen the quality of higher education and the creation of national R&D systems to serve as a bridge between businesses and universities, including an innovative drive to develop a few Centers of Excellence in teaching and research, focused on locally relevant and globally competitive areas.
Relationship to CAS

The Government of Montenegro is committed to investing both financially and structurally in utilizing its human capital to drive economic expansion. To this end, it is seeking support for improving its capacity to produce the right kinds of quality human capital as well as the research and innovation elements that emerge from human capital improvements. Strengthening human capital and innovation infrastructure capacities is a pre-requisite for effective participation in the EC’s framework programs and for integration into the European Research Area. With this as its backdrop, this proposed project has emerged as an important instrument for promoting large-scale improvements in Montenegro’s higher education, research, and innovation sectors.

This project falls directly within Priority 1 of the CPS, Strengthen institutions and competitiveness in line with EU accession requirements. Higher education, research, and innovation in the context of sustainable and expansive economic development are completely entwined. It also corresponds directly to two recent government initiatives: The new Strategy for Higher Education Development and Finance (adopted April 2011) and the law on Scientific Research Activity (2008).

Applied knowledge is the key in this context for relevant and impactful innovation and technology transfer, and this partnership between the Ministries of Science and of Education and Sport and the World Bank can provide the large-scale leverages needed to jump start the process of moving HE, Research, and Innovation into mainstream economic drivers for Montenegro. This will support Montenegro as it moves closer to EU accession, as it will directly help the Government develop the capacity to meet the EU Acquis standards in the areas of enterprise and industrial policy and science and research and it to align the economic directions with the priorities expressed in the Europe 2020 Strategy.

II. Proposed Development Objective(s)

Proposed Development Objective(s)

The proposed project development objective is to improve the quality and relevance of higher education and research in Montenegro.

Key Results

The proposed Project Development Objective Indicators (project outcomes) are:

i. Quality of higher education: complete accreditation of three main universities, utilizing new quality assurance and accreditation measures developed in accordance with Bologna-defined EU norms and practices, as a proxy for improved quality of the higher education in Montenegro

ii. Relevance of higher education: Perception of increased relevance of higher education programs and degrees as evidenced in surveys of businessmen and employers carried out at the beginning and end of the project

iii. Relevance of research: increased quotations of research work produced in research institutions

III. Preliminary Description

Concept Description

Component 1. Higher education finance reforms and implementation of Quality Assurance norms. This component would finance technical assistance, training for capacity building, and competitively awarded grants to higher education institutions through the following: (i) capacity building for the Council of Higher Education; (ii) support for membership in the European Quality Assurance Register (EQAR) and the European Network of Quality Assurance Agency (ENQA); (iii) support for implementation of reaccreditation procedures for all universities and institutes; (iv) support for internal quality assurance capacity building; and (v) building of a National Qualifications Framework (NQF)

Component 2. Human capital development through Internationalization Initiatives. The following activities have been identified as key intervention areas to improve and utilize internationalization activities for quality enhancement of Montenegrin teaching, learning, and research: (i) creating a facilitating agency within the MoES, to provide administrative support mechanisms to for international students and scholars, while building capacity within the Institute for International Science, Education, Cultural and Technical Cooperation; (ii) creating a small grants program to promote international scholarship in areas deemed of significant national interest; (iii) conducting analytical studies on the Montenegrin Diaspora and how best to capitalize on the Diaspora for international opportunities for Montenegrin scholars and students; (iv) conducting an analytical study on the internationalization context of Montenegro; and (v) utilization of the internationalization study to direct funds toward those recommended areas deemed key priorities in both the short- and long-term.

Component 3. Establishing a competitive research and innovation environment, anchored by competitive grant instruments and a pilot Center of Excellence. This component would finance technical assistance, training, procurement of goods and services, and minor civil works and would include: (i) completion of a feasibility study on Centers of Excellence (CoEs) in the Montenegrin; (ii) establishment of one Centre of Excellence; (iii) expansion of the existing #National Projects# research grants; and (iv) assessment of the labor markets for the research and innovation community.

IV. Safeguard Policies that might apply
V. Tentative financing

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Safeguard Policies Triggered by the Project

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