A Weeklong event of Millennium Development Goals

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ABSTRACT

One of the goals of the Millennium Development Goals (MDG) [1] [2] is to promote engineering education, capacity building and applications for poverty eradication and sustainable development.

Noting the recommendations of the World Engineers’ Conventions in Hanover, 2000 (“Humanity, Nature and Technology”), and Shanghai, 2004 (“Engineers Shape the Sustainable World”), regarding the importance of engineering in social and economic development and the need for capacity building, and noting that the third World Engineers’ Convention was held on December in Brasilia in 2008 (“Engineering: Innovation with Social Responsibility”). These recommendations highlight the need for the promotion of engineering education for development, with direct implications in the training of people for autonomy and sustainable development.

CDIO, as a framework to produce the next generation of engineers, provides students with an education stressing, beside others, operating real-world systems. Engineering education must take into account the surrounding environment, namely the goals set by international organizations and governments as they will represent additional opportunities for students at the labour market.

The weeklong event of Millennium Development Goals was held on October 2009, at Polytechnic Porto School of Engineering (ISEP) and other institutions in Porto. There were several higher education institutions involved, as well a Non Governmental Organisations for Development (NGOD) and other local organisations, such as: Universidade Católica do Porto; Escola Superior de Educação do Porto; Engenho&Obra (NGOD E&O); Agência ODM (United Nations); Campanha do Milénio das Nações Unidas; Centro Regional de Excelência em Educação para o Desenvolvimento Sustentável da Área Metropolitana do Porto.
During this week, the students showed their work related with the MDG Goals. There was a national photography contest, an MDG Festival and a film contest about MDG Goals. ISEP also organized a marathon on the 17th October, the International Day for Poverty Eradication.

Students contributed actively for this event. ISEP students developed the MDG week website and a social network to support the event, among other contributions. The MDG week also included the International Day for the Eradication of Poverty "Stand Up Against Poverty" (www.levanta-te.org) action, which wanted to draw the attention of world leaders to the importance of the MDG. The 2009 action was a new world record, with over 173,000 people involved.

The poster presents the activities undertaken during this week

**KEYWORDS**

Millennium Development Goals: Eradicate extreme poverty and hunger; Achieve universal primary education; Promote gender equality and empower women; Reduce child mortality; Improve maternal health; Combat HIV/AIDS, malaria and other diseases; Ensure environmental sustainability; Develop a Global Partnership for Development.

**WHAT ARE THE MILLENNIUM DEVELOPMENT GOALS?**

The Millennium Development Goals (MDGs) are eight goals to be achieved by 2015 that respond to the world’s main development challenges. The MDGs are drawn from the actions and targets contained in the Millennium Declaration that was adopted by 189 nations-and signed by 147 heads of state and governments during the UN Millennium Summit in September 2000.

The eight MDGs break down into 21 quantifiable targets include:

- **Goal 1: Eradicate extreme poverty and hunger**
  - Halve, between 1990 and 2015, the proportion of people whose income is less than one dollar a day.
  - Achieve full and productive employment and decent work for all, including women and young people.
  - Halve, between 1990 and 2015, the proportion of people who suffer from hunger.

- **Goal 2: Achieve universal primary education**
  - Ensure that, by 2015, children everywhere, boys and girls alike, will be able to complete a full course of primary schooling.

- **Goal 3: Promote gender equality and empower women**
  - Eliminate gender disparity in primary and secondary education preferably by 005, and at all levels by 2015.
• **Goal 4: Reduce child mortality**
  o Reduce by two-thirds, between 1990 and 2015, the under-five mortality rate.

• **Goal 5: Improve maternal health**
  o Reduce by three quarters, between 1990 and 2015, the maternal mortality ratio.
  o Achieve, by 2015, universal access to reproductive health.

• **Goal 6: Combat HIV/AIDS, malaria and other diseases**
  o Have halted by 2015 and begun to reverse the spread of HIV/AIDS.
  o Achieve, by 2010, universal access to treatment for HIV/AIDS for all those who need it.
  o Have halted by 2015 and begun to reverse the incidence of malaria and other major diseases.

• **Goal 7: Ensure environmental sustainability**
  o Integrate the principles of sustainable development into country policies and programmes; reverse loss of environmental resources.
  o Reduce biodiversity loss, achieving, by 2010, a significant reduction in the rate of loss.
  o Halve, by 2015, the proportion of people without sustainable access to safe drinking water and basic sanitation (for more information see the entry on water supply).
  o By 2020, to have achieved a significant improvement in the lives of at least 100 million slum-dwellers.

• **Goal 8: Develop a Global Partnership for Development**
  o Develop further an open trading and financial system that is rule-based, predictable and non-discriminatory. Includes a commitment to good governance, development and poverty reduction-nationally and internationally.
  o Address the special needs of the least developed countries. This includes tariff and quota free access for their exports; enhanced programme of debt relief for heavily indebted poor countries; and cancellation of official bilateral debt; and more generous official development assistance for countries committed to poverty reduction.
  o Address the special needs of landlocked and small island developing States.
  o Deal comprehensively with the debt problems of developing countries through national and international measures in order to make debt sustainable in the long term.
o In cooperation with pharmaceutical companies, provide access to affordable essential drugs in developing countries.

o In cooperation with the private sector, make available the benefits of new technologies, especially information and communications.

Figure 1. The eight MDGs Goals

THE MILLENNIUM DEVELOPMENT GOALS WEEK PROGRAM ORGANIZED BY ISEP

Table 1
The Millennium Development Goals Week activities organized by ISEP

<table>
<thead>
<tr>
<th>Activities</th>
<th>October</th>
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</thead>
<tbody>
<tr>
<td>&quot;Freeze!&quot; in different places of Porto City</td>
<td>14 15 16 17 18 19 20 21</td>
</tr>
<tr>
<td>XV Environment Olympic Day (Catholic University of Porto)</td>
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<tr>
<td>CRE_PORTO (Regional Center of Excellence in Education for Sustainable Development in Porto City) in the Afternoons of Millennium in Almeida Garrett Library invited young adults to discuss what citizens can do to help the world's governments to fulfill their part in the Millennium Declaration.</td>
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### Table 2
The Millennium Development Goals Week activities organized by ISEP (Cont.)

<table>
<thead>
<tr>
<th>Activities</th>
<th>October</th>
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<tr>
<td><strong>Documentary MDGs Film Series</strong></td>
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<td>&quot;What does it mean today to address the MDGs?&quot;</td>
<td>14</td>
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<tr>
<td>Goal 2: Achieve universal primary education</td>
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<td>Di Mndjeris talks</td>
<td>16</td>
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<td>Disclosure of the MDGs and Trafficking in Human Beings</td>
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<td>Goal 8: What to do to develop a Global Partnership for Development?</td>
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<tr>
<td>Goal 1: Eradicate extreme poverty and hunger. What are the possibilities?</td>
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<tr>
<td>Goal 3: Promote gender equality and empower women</td>
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<tr>
<td>Goal 8: Why it is essential to develop a Global Partnership for Development?</td>
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<td><strong>Open Classes on the MDGs integrated disciplines of Social Education Course</strong></td>
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<td>Presentation of the entities involved in the MDGs Week</td>
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<td>namely the NGOs</td>
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<td>Sustainability Report - The hows and whys?</td>
<td>16</td>
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<td>Strategy Corporate Social Responsibility LIPOR</td>
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<td>ISEP Action Plan for Sustainability</td>
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<td>Protection of Natural Resources: THE CONCEPT OF DISCHARGE NULL</td>
<td>19</td>
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<td>Sustainable Development and Higher Education</td>
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<td>Energy, Is there a Future?</td>
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<td>Education and Development Cooperation</td>
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<td>Ensure environmental sustainability - EDP</td>
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<tr>
<td>LIPOR - a project for the future</td>
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<tr>
<td>Environmental Sustainability</td>
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<tr>
<td>&quot;The Power of Care&quot; and &quot;The Care for the Power&quot;</td>
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<td>Ethics - Sustainability factor</td>
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<td>HAPPY PORTO - successful experience</td>
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<td>Development Projects and its true impact</td>
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<td><strong>MDGs Conference</strong></td>
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<td><strong>Prize Delivery MDGs Photo Contest</strong></td>
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<td>MDGs Conference</td>
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<td>MDGs Festival</td>
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<td>At the beginning of collective Half Marathon in the Porto more than 9000 people helped to achieve a new world record - &quot;Stand Up&quot; 2009</td>
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<tr>
<td>ISEP organised a food raise for the Banco Alimentar Contra a Fome</td>
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<tr>
<td>Exhibition throughout Porto of the photographs which participated in the MDGs Photography Contest</td>
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SOME PHOTOS OF MILLENNIUM DEVELOPMENT GOALS WEEK

Freeze

During 14 October afternoon, starting at 14 hours, there was a "Freeze" action, which consists of people "freezing" together. The objective was to call attention to the problems affecting humanity.

Figure 1 – Photos of some moments of the "Freeze!" action in different places of Porto city
**Stand Up Against Poverty**

On the 16th, 17th and 18th October 2009, millions of people around the world participated in the movement ‘Stand Up and Take Action’ in the fight against poverty joining the global mass mobilization and showing their support to the Millennium Development Goals.

‘Stand Up & Take Action’, initiated and coordinated by the United Nations Millennium Campaign and the Global Call to Action Against Poverty (GCAP), is a global event during which millions of citizens – civil society organizations, faith based groups, local governments, youth, media and other role players – take action and call upon world leaders to keep the pledge of achieving the MDGs, as an expression of solidarity with the world’s poorest and most vulnerable.

The Guinness World Record was again beaten by people from around the world that requires its leaders to end poverty.

More than 173 million people joined the events of ‘Stand Up and Take Action’ achieving a new record as the largest mobilization in history for one cause.

The Guinness World Record was exceeded during this weekend when 173,045,325 citizens and citizens gathered in over 3,000 events for over 120 countries to demand their governments to eradicate extreme poverty and meeting the Millennium Development Goals (MDGs).

The Guinness World Record is certified as "Stand Up and acts as the largest mobilization in recorded human history" which in its fourth year, has been an increase of about 57 million over last year.

Figure 3 show different moments during the MDG week.
During MDGs Festival

At the beginning of collective Half Marathon in the Porto
More than 9000 people

Figure 2 – "Stand Up Against Poverty"
MDGs Photo Contest

A photography contest was also organised and the top photographs were displayed in the site dedicated to this week of the MDGs [3]. In figure 4 we present the top 4.

1st Place

2nd Place
3rd Place

Figure 3 – MDGs Photo Contest [3]

4th Place
**MDGs Festival**

During this Festival the students and several NGOs presented their work related with the MDGs. Also, throughout the afternoon and evening, the community appreciated and enjoyed the presentations of projects, games, drawings and sketches [4].

![Figure 4 – MDGs Festival Photos](image)

**CONCLUSION**

One of the main goals of the Millennium Development Goals (MDGs) is to promote engineering education, capacity building and applications for poverty eradication and sustainable development. During this week, ISEP was able to promote the MDGs, improving public awareness to the biggest problems humanity faces today.

This week linked the MDG event at ISEP with CDIO standards 1, 2, 5, 8 and 9 [5].

STANDARD 1: CDIO as Context
STANDARD 2: CDIO Syllabus Outcomes
With this project, the students and teachers involved had opportunity to realise that there is a large commitment of civil society, including various NGOs, in achievement of the MDGs and the empowerment of people and institutions. Higher education institutions are deeply involved in some of these activities. As an example ISEP has just created a joint initiative with the NGOD E&O, to help students with economic and learning difficulties.

REFERENCES AND BIBLIOGRAFY


Biographical Information
Eduarda Pinto Ferreira is a Professor of Mathematic at ISEP - Instituto Superior de Engenharia do Porto, Portugal. PhD in Science Engineering, Chairman of the 3rd ESICUP Meeting (EURO Special Interest Group on Cutting and Packing), international conference in Porto (ISEP), March 2006, Member of the Scientific Committee of JBLE-09 (Jornadas Luso-brasileiras de Engenharia), Porto (ISEP), February 2009. Attend all CDIO conferences since 2008. President of Pedagogical Council since January 2010.

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