GLOBAL NEEDS QUESTIONNAIRE AND ITS RESULTS

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CONFLICTS OF INTEREST

• None
LEARNING OBJECTIVES

To provide an overview of the AAPM Global Needs Assessment (GNAC) survey process

To learn about the three GNAC surveys

To view the preliminary results of the GNAC survey for departmental/institutional leaders
INTERNATIONAL COUNCIL

Global Education and Training

Global Data and Information Exchange

Global Liaisons

Global Medical Physics Education and Training

Global Needs Assessment

Global Research and Scientific Innovation
Global Needs Assessment Committee - Charges

Develop, implement, and maintain processes for performing comprehensive quantitative assessments of medical physics needs and resources within regions.

Using the developed processes, perform routine assessment of medical physics needs and resources in each region.
NEED ASSESSMENT SURVEY
NEED ASSESSMENT SURVEY

- Catalyst for future work of the International Council
- Snapshot of current status of global needs
- Provide baseline metrics
- Guide for identifying key deliverables by the International Council Committees
- Afford assessment of progress
IDENTIFIED NEED FOR THREE SURVEYS

1st survey: Completed by Institutional Leaders

- Broad view of institutional activities, available infrastructure, and needs
- Currently Open

2nd survey: Completed by Medical Physicists

- Frontline of medical physics practice, education, and research
- In Development

3rd Survey: Completed by Industry Partners

- Unique challenges to provide and maintain equipment and services in low resource settings
- In Development
SURVEY DESIGN

• Ongoing input and final revision by a Survey Design & Analysis Consultant

• Formal approval by Institutional Review Board (IRB)

• Published on a web-based platform
SURVEY DISTRIBUTION

AAPM EMAIL  
AAPM WEBSITE  
SOCIAL MEDIA  
GLOBAL CONTACTS  
REGIONAL CONFERENCES
SURVEY ANALYSIS

TRENDS

SPECIFIC NEEDS

POTENTIAL FOR COLLABORATION
SURVEY ANALYSIS

Geographic
- Regional
- Country

Specialty
- Imaging
- Therapy

Practice Specific Needs
- Education/Training
- Infrastructure/Equipment
- Research
DISSEMINATE SURVEY RESULTS

Survey Data → Journal Publication
PRELIMINARY SURVEY RESULTS: DEPARTMENTAL/INSTITUTIONAL LEADERS
PRELIMINARY SURVEY RESULTS:
DEPARTMENTAL/INSTITUTIONAL LEADERS

• Includes Imaging and Radiotherapy
• Results as of 6/15/2022
• 2206 Views
• 96 Complete Responses
• Average Completion Time: 28 Minutes
SURVEY RESPONSES BY REGION

- Africa: 26
- Americas: 20
- South-East Asia: 15
- Europe: 10
- Eastern Mediterranean: 20
- Western Pacific: 5

https://www.who.int/
Introduction
- 4 Questions

Infrastructure Needs
- 14 Questions

Education Needs
- 11 Questions

Research Needs
- 7 Questions

General Information
- 7 Questions
SECTION: INTRODUCTION
What are the BIGGEST Needs at your institution at this time? (Select No More Than 2)

- **Equipment**: 53.1%
- **Qualified Staff**: 38.5%
- **Training**: 28.1%
  - Equipment Operation
  - Patient Treatment: 21.9%
- **Software**: 17.7%
Would you support collaboration between your institution’s medical physicists and the AAPM?

- Yes: 90.62%
- Maybe: 3.12%
- Need More Information: 6.25%
- No: 0%
SECTION: INFRASTRUCTURE
Which are the greatest infrastructure needs or areas for improvement at your institution?

- Training: 67.7%
- Financial: 41.7%
- Research Expertise: 32.3%
- Personnel: 25%
- Information Technology: 9.4%
Which types of educational support are the highest priority at your institution?

<table>
<thead>
<tr>
<th>Educational Need</th>
<th>% Respondants</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clinical training</td>
<td>59.4%</td>
</tr>
<tr>
<td>Course development in medical physics</td>
<td>45.8%</td>
</tr>
<tr>
<td>Training on conducting research</td>
<td>39.6%</td>
</tr>
<tr>
<td>Training on medical equipment</td>
<td>32.3%</td>
</tr>
</tbody>
</table>
EDUCATION

- Affiliated with formal/structured education program: 31%
- Plans to initiate program in next 3 years: 57.1%
- Medical Physics recognized profession: 66.7%
SECTION: RESEARCH
**Research Need** | **% Respondants**
--- | ---
Funding, obtaining grants | 68.8%
Equipment | 47.9%
Expertise | 40.6%
Applying for and managing grants | 30.2%
Currently Conduct Research: 57.1%
Capacity to Conduct Computational Research: 57.3%
Capacity to Conduct Clinical Trials: 61.1%
RECURRING THEMES

TRAINING

EQUIPMENT

QUALIFIED PERSONNEL
Global Needs Assessment Committee

• One of Six Committees of International Council
• Responsible for assessing needs in different regions of the world

Needs Assessment Surveys

• Open to Responses
  • Institutional/Departmental Leaders
• In Development
  • Medical Physicists
  • Industry Partners
SUMMARY

Institutional Department Leader Survey

• 96 Complete Responses as of 6/15/2022
• Responses from all 6 Global Regions

Question Topics

• General
• Infrastructure
• Education
• Research

Greatest Needs Preliminary Analysis

• Training
• Equipment
• Qualified Personnel
WE INVITE YOU TO:

Help disseminate the survey to global institutional leaders

ADDITIONAL REQUESTS:

Help Distribute Medical Physics Survey & Partners in Industry Survey After They are Open
THE END

THANK YOU FOR YOUR TIME AND ATTENTION