



MINISTRY OF COMMUNICATIONS
AND MULTIMEDIA MALAYSIA



Defining the *holistic competencies* expected of *skilled personnel* in the *cybersecurity sector* by describing the *knowledge, skills* and *attitudes* needed to perform in a particular occupation.



GLOBAL ACE SCHEME CENTRE OF EXCELLENCE FOR CAPACITY BUILDING AND LIFELONG LEARNING

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GLOBAL ACE SCHEME COE ALIGNMENT WITH ACTION LINES & SDGs

Contribute to the implementation of the WSIS Action Lines C5: Building confidence and security in use of ICTs



ITU Mandates on Cybersecurity –
Global Cybersecurity Agenda (GCA)



- Through delivering global quality indigenous cybersecurity professional certification programs;
- Ensure inclusive and equitable quality education; and
- Promote lifelong learning opportunities for all.
- Through the Global ACE Scheme COE Country Chapter implementation;
- Promote continuous cybersecurity education development;
- Promote sustainability;
- Reduce inequalities;
- Enable collaborative workforce development, talent mobilisation;
- Encourage regional partnerships; and
- Revitalize the global partnership for sustainable development.

CYBER SECURITY WORKFORCE SHORTAGE

(ISC)² reported in the year 2019:

- Global cyber security workforce will have about 4.07 million gaps while in
- Asia Pacific alone will have about 2.6 million.

- Estimated number of cyber security knowledge workers available in Malaysia is around 11,000. These include the practitioners, registered professionals and domain experts.
- However, shortage is estimated at not less than 15,000 due to the escalating global cyber treats issues, pandemic issues and the technology advancement, such as the IR4.0

CYBER SECURITY CAPACITY BUILDING FRAMEWORK

GLOBAL ACE
Global Accredited Cybersecurity Education (ACE) Scheme

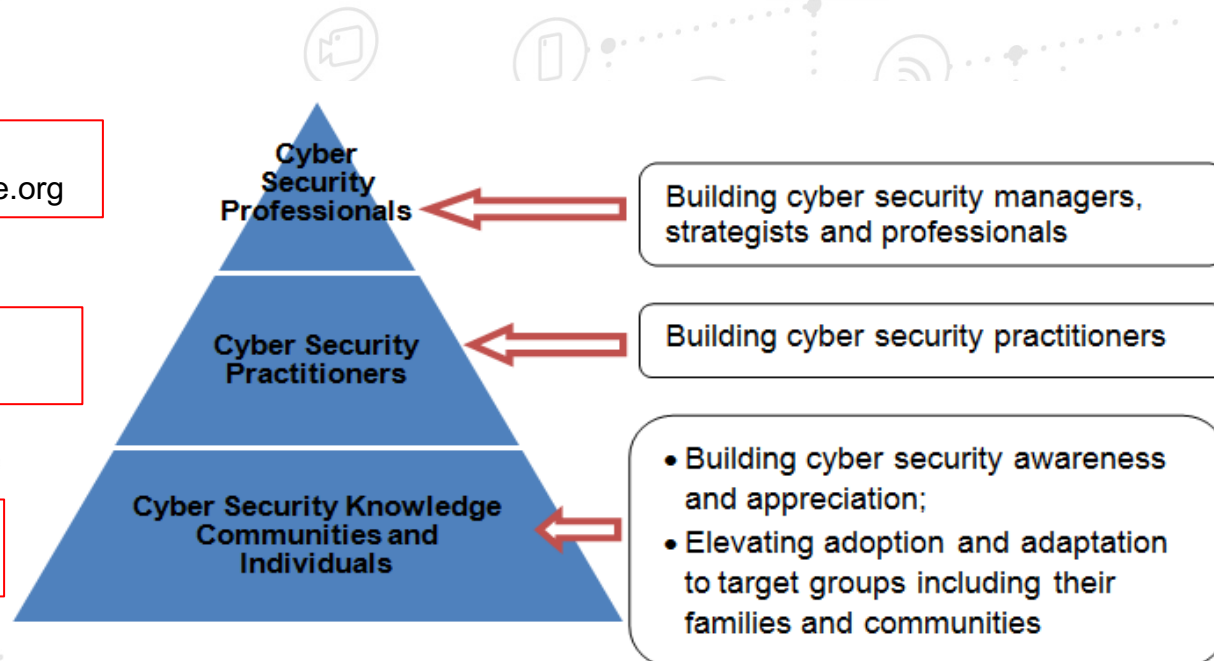
Global ACE Scheme
<https://www.cybereducationscheme.org>

CyberGuru
CYBER SECURITY PROFESSIONAL DEVELOPMENT

Cyberguru
<https://www.cyberguru.my>

CyberSAFE
MALAYSIA

Cybersafe
<https://www.cybersafe.my>



OBJECTIVES

To nurture cyber security knowledge groups and/or individuals that are resilient to cyber security incidents

To nurture cyber security practitioners that are technically capable and proficient in the operation;

To nurture cyber security professionals that are capable in strategizing, planning and executing cyber security initiatives

GLOBAL ACE SCHEME

The scheme is developed in collaboration with the government agencies, industry partners and academic institutions.

Supported by:



Developed in tandem with:



Recognised by:



A holistic framework of cybersecurity professional certification that outlines:

- ▶ The overall approach;
- ▶ Identification and classification of cybersecurity domains;
- ▶ Independent assessments;
- ▶ Impartiality of examinations;
- ▶ Competencies of trainers; and
- ▶ The requirements of continual professional development.

Vendor-neutral and industry driven professional scheme to:

- ▶ Certify and recognise cybersecurity workforce;
- ▶ Assure cybersecurity capabilities; and
- ▶ Validate core skills, knowledge, attitudes and experience.

Global ACE Scheme
Mutual Recognition Areas

Knowledge, Skills & Attitudes

Professional Examinations

Professional Credentials

Registered Trainers

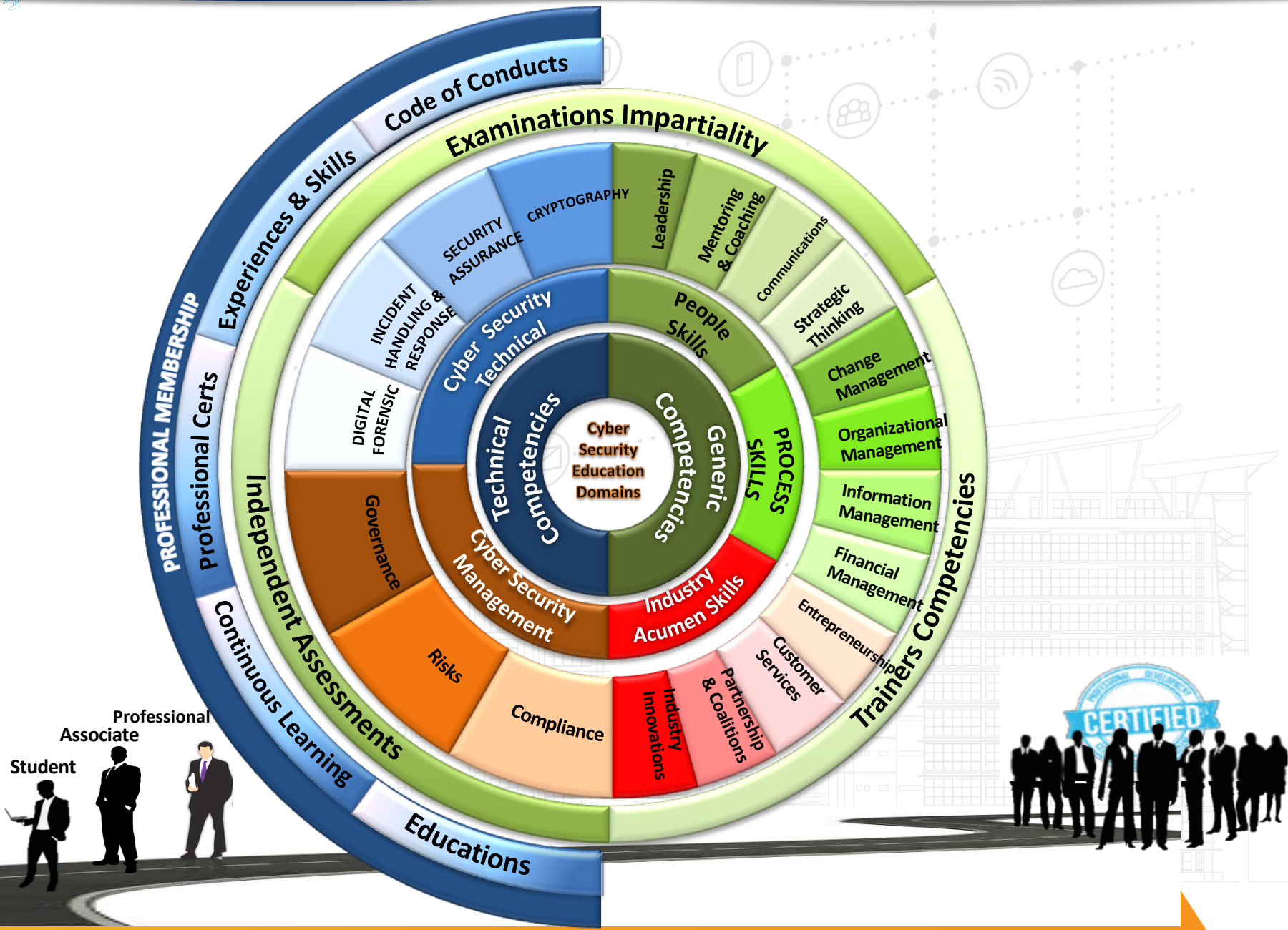
Registered Training Programs

ASPIRATIONS



- Evolving in parallel with technology
- Adopting holistic strategy and effectively applying cyber security innovative features and techniques
- Strengthening Public-Private-Academia Partnership and International Collaboration through mutual recognition arrangement

GLOBAL ACE CERTIFICATION



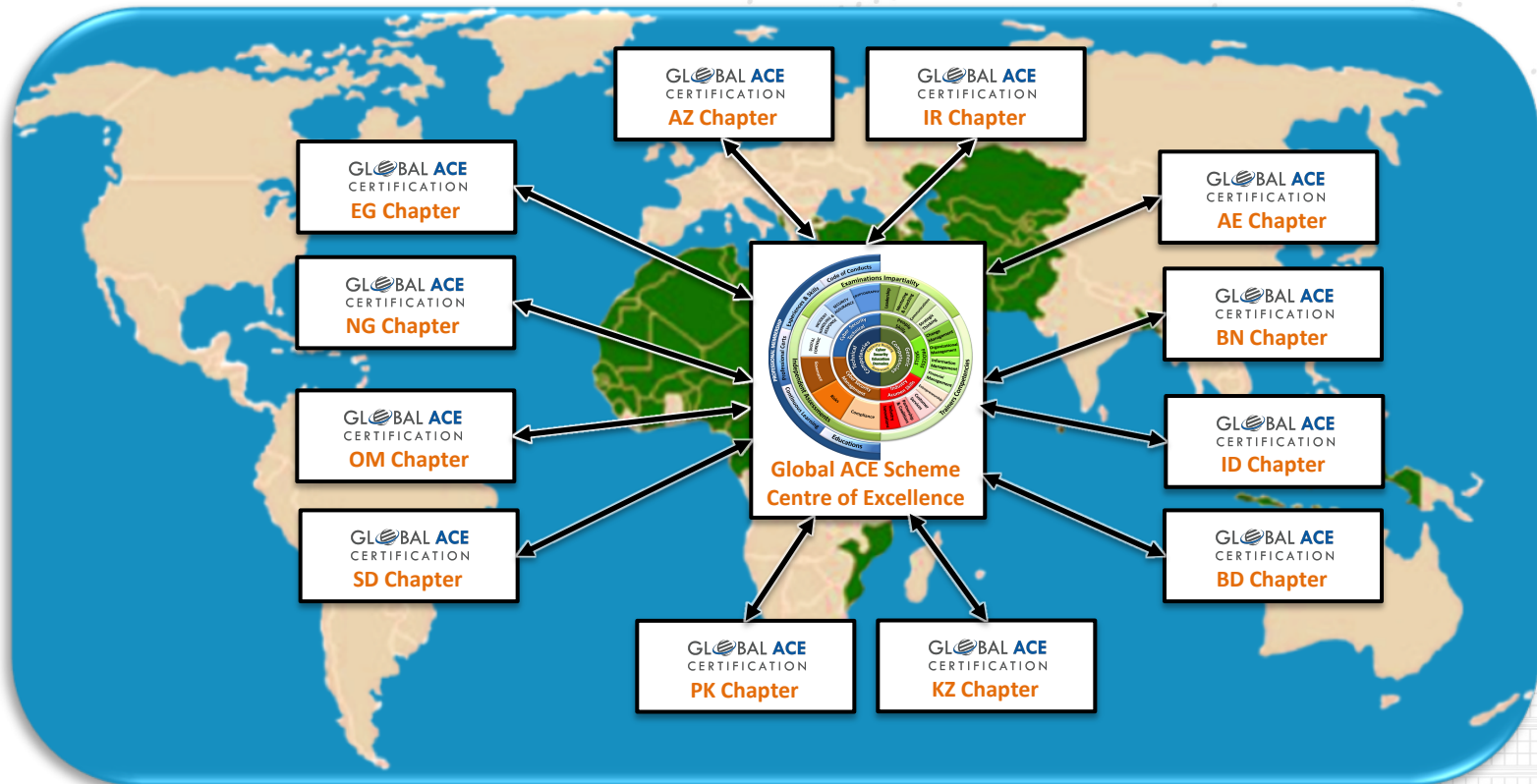


GLOBAL ACE SCHEME COE CAPACITY BUILDING & LIFELONG LEARNING

- The Global ACE Scheme CoE project establishes a single converging platform within the region for:
 - **Cybersecurity capacity building and lifelong learning**
 - **Permit continual enhancement through the lifelong learning**
- It allows individuals to develop capabilities at their own pace
- The philosophy is to:
 - **Realise an equitable capacity building eco-system;**
 - **Empower professionals to cross-learning, share and transfer knowledge.**
- This project will articulate an **affordable cybersecurity education for everyone** while **ensuring individual's continuous improvement** towards the global aspiration.

ENABLING THE MUTUAL RECOGNITION: COUNTRY CHAPTER RECOGNITION ARRANGEMENT

Global ACE Scheme COE Recognition Arrangement allow mutual recognition of certified cyber security professionals, which create value for cyber security industry and participating countries.



Global ACE Scheme COE
Mutual Recognition Areas

Knowledge, Skills & Attitude
Professional Examinations
Professionals Credential
Registered Trainers
Registered Training Programs

SOCIAL, ECONOMIC, AND ENVIRONMENTAL IMPACT

Country Chapter



ITU Countries
Partnership

- Share a similar structure, methodology and philosophy
- Empower local to continually developed, enhanced and
- Organically improved operations.

Global Standard Quality Education



Talent Mobilisation

- Availability of quality and standardise cybersecurity education programs specifically for local communities.
- Enhance local developers in producing quality contents towards international standards' aspirations.
- Provide avenue to consistently enhance technical capabilities.

Commercialisation



Financial
Sustainability

- Commercialisation of Scheme's products, services & output.
- Enabling financial sustainability.

SOCIAL, ECONOMIC, AND ENVIRONMENTAL IMPACT

Use of ICT activities during COVID19

- Circulation of e-materials such as Covid-19s' standard operation procedures, brochures, videos and checklist on the cybersecurity awareness via national media mainstreams;
- Developed and deliver cybersecurity e-learning programs, which are picking up exponentially;
- Global ACE Scheme COE cross-nation capacity building e-workshops to solicit input and feedback of cybersecurity experts from ITU stakeholders, cybersecurity experts in the region, education institutions, government agencies and industry experts.

1. Cooperation/Partnership in Cyber Security Capacity Building
2. Implementation of the Global ACE Scheme CoE & Country Chapter
3. Cyber Security Professional Certifications for Everyone



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Thank you

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