OJT LIST OF COMPETENCIES

Course Title: WSDip in Security Systems Engineering   **Level:** Diploma

S/N	LIST OF COMPETENCIES (STANDARD)	Company to indicate '✓' it is able to provide
	Design physical security system solution	
1.	Conduct security risk/safety assessment (BCA building safety code)	
2.	Develop security risk control plans	
3.	Propose security system measures	
	Manage video surveillance system	
4.	Develop video surveillance system plan	
5.	Install video surveillance system	
6.	Commission video surveillance system	
	Manage access control and intrusion detection system	
7.	Install access control system	
8.	Maintain access control system	
9.	Install intrusion detection system	
10.	Maintain intrusion detection system	
	Manage network infrastructure	
11.	Establish network infrastructure requirements	
12.	Deploy network infrastructure	
13.	Manage network services	
	Manage cloud services	
14.	Set up cloud infrastructure and services	
15.	Manage cloud security threats	
16.	Manage data protection measures	
	Manage cybersecurity ops and incident	
17.	Configure log sources	
18.	Analyse security events	
19.	Report security events with solutions	
20.	Handle cybersecurity incident	
	Enhance cybersecurity of physical security system solution	
21.	Conduct cybersecurity risk assessment for physical security system	
22.	Propose cybersecurity measures for physical security system	
23.	Implement cybersecurity measures for physical security system	
24.	Maintain cybersecurity systems	
25.	Monitor cybersecurity systems	
	Perform cyber-physical security system integration	
26. .	Coordinate cyber-physical security system integration	
27.	Perform integration of cyber-physical security components	
28.	Test integrated cyber-physical security system	

MODULE SYPNOSIS – WSDip in Security Systems Engineering

Course Objective

The course equips trainees with the skills, knowledge and professional attributes to design, deploy, manage implementation and maintenance of physical security projects, as well as apply AI and automation into the systems to optimise operational efficiency and reliability.

Modules Synopsis

Network Infrastructure

On completion of the module, trainees should be able to set up, configure and manage wired and wireless Local Area Network (LAN). They should also be able to explain networking terminologies, concepts and technologies.

Video Surveillance & AI Analytics

On completion of the module, trainees should be able to set up, configure, test and troubleshoot video surveillance systems and video analytics. They should also be able to explain video surveillance terminologies and concepts.

Intrusion & Access Control with AI

On completion of the module, trainees should be able to set up, configure, test and troubleshoot Intrusion and Access Control Systems. They should also be able to explain access control terminologies and concepts.

Cybersecurity for Security Systems

On completion of the module, trainees should be able to configure, test and troubleshoot Cybersecurity solutions to protect security systems. They should also be able to explain security threats and vulnerabilities, technologies and tools used in implementing effective Cybersecurity solutions.

Server & Storage Management

On completion of the module, trainees should be able to set up and maintain server and storage systems in a systematic manner.

Project Management & Technical Writing

On completion of the module, trainees should be able to plan, execute and monitor security system project using the various project management tools and techniques to meet the project scope, schedule and cost requirements. They should also be able to prepare and write technical reports.

Security Risk Assessment & System Design

On completion of the module, trainees should be able to conduct security risk assessment and system audit. They should also be able to identify security gaps and propose security system solution.

MODULE SYPNOSIS – WSDip in Security Systems Engineering

Security System Integration & Programming
On completion of the module, trainees should be able to design, implement an integrated security system solution and write program to integrate devices into security systems by applying programming concepts and languages.

Company Project
On completion of the module, trainees should have applied their acquired competencies in an authentic project that would value-add to the company. This will enable them to communicate valuable insights to clients, enhancing their decision-making processes.

TRAINING PATTERN SCHEDULE

WSDip in Security Systems Engineering

Block Release - Trainees attend daily lessons at ITE for a continuous period and then resume the next block of OJT at the workplace.

April'26 Intake	April – June 2026		July – September 2026		October – December 2026		January – March 2027	
1st Year Off-JT @ ITE	**8 Weeks Block**	ITE Vacation (June) 4 weeks	**OJT in Company**	ITE Vacation (Sept) 2 weeks	**OJT in Company**	ITE Vacation (Dec) 4 weeks	**OJT in Company**	ITE Vacation (March) 2 weeks

April'26 Intake	April – June 2027		July – September 2027		October – December 2027		January - March 2028	
2nd Year Off-JT @ ITE	**OJT in Company**	ITE Vacation (June) 4 weeks	**OJT in Company**	ITE Vacation (Sept) 2 weeks	**8 Weeks Block**	ITE Vacation (Dec) 4 weeks	**OJT in Company**	ITE Vacation (March) 2 weeks

April'26 Intake	April – June 2028		July – September 2028		
3rd Year Off-JT @ ITE	**OJT in Company**	ITE Vacation (June) 4 weeks	**8 weeks Block**	ITE Vacation (Sept) 2 weeks	**WSDip Programme 2026** **Start: 1 April 2026** **End: 30 September 2028** **Duration: 2.5 years** ⚠️ **Final results release may be later than programme end date**