15. Evaluate ergonomic aspects of industrial logistics

Functional Area: Op&Log/QA

Assessment criteria

LO15a.1. Identifies and designs plans to incorporate ergonomic aspects into industrial processes.

- Follow and maintain procedures to be in line with HMI general requirements
- Ensure dimensional accuracy of assembly by using different instruments/gauges/measuring tools
- Set up workplace/ assembly location with due consideration to operational process and HMI and safety requirements
- Demonstrate possible solutions and agree tasks within a team
- Mount the work and tool holding devices with required alignment and check for their functional usage to perform machining operations

Knowledge

- Knowledge of Principles and theories relevant to mechanical, electrical, electronic engineering, and manufacturing technologies.
- Know the principles of HMI design and development within the field of mechatronics engineering and its disciplines
- Knowledge of material (physical, electromagnetic characteristic...)

Skills

- Judge engineering/manufacturing decisions considering balanced costs, safety, quality, reliability vs HMI aspects
- Collaborate effectively within multidisciplinary teams
- Identify, analyse, synthesize and act on information from a range of sources, verbal, written and in electronic format
- Understand functional application of different levers, stoppers, adjustment etc.
- Understand anatomy of robots/cobots and their interactions with human operators

Transferable skills

- Understand descriptions, specifications, manuals and other info typical of the profession in English
- Ability to communicate effectively, orally and in writing with "engineering" community and with "society" (extrapolating concepts for "nonexperts) through an abstraction approach

Ability to submit and discuss presentations on practical cases
Appreciate limits and future developments of human-robotics interaction, from social/labour related point of view