



Australian Government

Department of Education, Employment and Workplace Relations

MSS402021A Apply Just in Time procedures

Release: 1

MSS402021A Apply Just in Time procedures

Modification History

New unit, superseding MSACMT221A Apply Just in Time (JIT) procedures - Equivalent

Unit Descriptor

This unit of competency covers the skills and knowledge required to work in an organisation implementing Just in Time (JIT) procedures.

Application of the Unit

This unit applies to an individual working in an organisation following JIT who will need to follow procedures which are specific to JIT, such as the controlled flow of material (e.g. the use of kanban and elimination of waste). This will involve the individual in the application of the pull system to their job and the authorisation of product/material flows in accordance with procedures and their level of authority.

This unit requires the application of skills associated with planning and organising and self-management to deliver product on demand using necessary tools, equipment and processes to meet production requirements. The unit also requires an ability to recognise and act on problems that may interfere with meeting production demands.

Licensing/Regulatory Information

Not applicable.

Pre-Requisites

Not applicable.

Employability Skills Information

This unit contains employability skills.

Elements and Performance Criteria Pre-Content

Elements describe the essential outcomes of a unit of competency.

Performance criteria describe the performance needed to demonstrate achievement of the element. Where bold italicised text is used, further information is detailed in the required skills and knowledge section and the range statement. Assessment of performance is to be consistent with the evidence guide.

Elements and Performance Criteria

1	Respond to indicator of demand	1.1	Identify pull of product through work role
		1.2	Recognise indicator of flow authorisation
		1.3	Identify production or service required
2	Make products or deliver service to demand	2.1	Make product or deliver service as required by ticket
		2.2	Identify any factors likely to prevent demand being satisfied in own work or work of the team
		2.3	Take action in accordance with procedures
3	Update demand information as required	3.1	Record information on ticket to procedures, as required
		3.2	Facilitate operation of flow authorisation as part of work
4	Recommend improvements	4.1	Examine the operation of the JIT system as it relates to own work
		4.2	Identify areas for improvement
		4.3	Identify any additional personal skill requirements to implement JIT procedures
		4.4	Recommend improvements

Required Skills and Knowledge

This section describes the skills and knowledge required for this unit.

Required skills

Required skills include:

- receiving ticket, kanban, order or other indicator of demand and interpreting correctly for own work function, including quantity, quality, time and delivery requirements
- ensuring that all production and movement of parts/material or delivery of a service for which the individual is responsible for takes place only as required by a downstream operation
- recognising and taking appropriate action on faults and other issues that may threaten the JIT delivery of own product or service
- reading and recording information on tickets or other indicators of demand
- suggest improvements to JIT system, as appropriate
- performing technical functions to meet indicators of demand from downstream and to issue indicators of demand upstream

Required knowledge

Required knowledge includes:

- relevant indicator of demands for own job
- own role in flow authorisation
- JIT methods relevant to job
- procedures for recommending improvements

Evidence Guide

The evidence guide provides advice on assessment and must be read in conjunction with the performance criteria, required skills and knowledge, range statement and the Assessment Guidelines for the Training Package.

Critical aspects for assessment and evidence required to demonstrate competency in this unit	A person who demonstrates competency in this unit must be able to provide evidence of the ability to: • identify the indicators of demand and the flow authorisation system in their work area • relate products and services supplied by suppliers and
--	--

	customers to the flow authorisation system • identify own tasks and responsibilities and relate them to the flow authorisation system • interpret received indicators of demand correctly for quantity, quality and time of delivery • contribute suggestions for improvement.
Context of and specific resources for assessment	Assessment of performance must be undertaken in a workplace using or implementing one or more competitive systems and practices. Access may be required to: • workplace procedures and plans relevant to work area • specifications and documentation relating to planned, currently being implemented, or implemented changes to work processes and procedures relevant to the assessee • documentation and information in relation to production, waste, overheads and hazard control/management • reports from supervisors/managers • case studies and scenarios to assess response to contingencies.
Method of assessment	A holistic approach should be taken to the assessment. Competence in this unit may be assessed by using some combination of the following to generate evidence: • demonstration in the workplace • workplace projects • suitable simulation • case studies/scenarios (particularly for assessment of contingencies, improvement scenarios, and so on) • targeted questioning • reports from supervisors, peers and colleagues (third-party reports) • portfolio of evidence. In all cases it is expected that practical assessment will be combined with targeted questioning to assess underpinning knowledge. Where applicable, reasonable adjustment must be made to work environments and training situations to accommodate ethnicity, age, gender, demographics and disability.
Guidance information for assessment	Assessment processes and techniques must be culturally

	appropriate and appropriate to the oracy, language and literacy capacity of the candidate and the work being performed.
--	---

Range Statement

The range statement relates to the unit of competency as a whole. It allows for different work environments and situations that may affect performance. Bold italicised wording, if used in the performance criteria, is detailed below. Essential operating conditions that may be present with training and assessment (depending on the work situation, needs of the candidate, accessibility of the item, and local industry and regional contexts) may also be included.

Competitive systems and practices	Competitive systems and practices may include, but are not limited to: • lean operations • agile operations • preventative and predictive maintenance approaches • monitoring and data gathering systems, such as Systems Control and Data Acquisition (SCADA) software, Enterprise Resource Planning (ERP) systems, Materials Resource Planning (MRP) and proprietary systems • statistical process control systems, including six sigma and three sigma • JIT, kanban and other pull-related operations control systems • supply, value, and demand chain monitoring and analysis • 5S • continuous improvement (kaizen) • breakthrough improvement (kaizen blitz) • cause/effect diagrams • overall equipment effectiveness (OEE) • takt time • process mapping • problem solving • run charts • standard procedures • current reality tree Competitive systems and practices should be interpreted so as to take into account:
--	---

	- the stage of implementation of competitive systems and practices - the size of the enterprise - the work organisation, culture, regulatory environment and the industry sector
JIT	JIT is a scheduling concept that calls for any item or service needed for an operation, whether a service, raw material, finished item, or anything in between to be available: - precisely when the service, product or operation is to be produced or undertaken - in the right quantity and at the right quality
Product	Product may include: - a physical product - a supporting utility service, such as water, gas, power - some other service (e.g. cranes and forklifts)
Flow authorisation	Flow authorisation refers to: a system which authorises the worker to make a product without reference to another authority
Indicator of demand	An indicator of demand may include: - kanban bin, ticket or similar - some other indicator of demand pull which authorises production or movement of an item (in some plants, this may also include authorisation using SCADA software) In continuous operations organisations, production is measured in terms of production rate (e.g. kg/h, tonne/day) and rate is increased/decreased according to the flow authorisation which may be a kanban (e.g. ticket, order from a supplier) or may be a SCADA signal from a remote facility (e.g. customer tank) saying that resupply is required or similar
Ticket	A ticket may include: kanban or some other record, paper or electronic, which constitutes the whole or part of the flow authorising system (where kanban bins are used, there may be no other record)
Kanban	Kanban refers to: a card or sheet used to authorise production or movement of an item and may vary in format or

	content between organisations and departments
SCADA	SCADA refers to: • a number of systems which automatically collect critical process data, perform required mathematical manipulations on it and then make control decisions and/or give required information to personnel for action
Pull system	A pull system refers to: • an operations planning system based on making on demand, as opposed to a push system based on making for stock using a sales forecast
Procedures	Procedures may include: • work instructions • standard operating procedures • formulas/recipes, batch sheets, temporary instructions and similar instructions provided for the smooth running of the plant • good operating practice as may be defined by industry codes of practice (e.g. good manufacturing practice (GMP) and responsible care) and government regulations Procedures may be: • written, verbal, computer-based or in some other format

Unit Sector(s)

Unit sector

Competitive systems and practices

Custom Content Section

Not applicable.