

CPCCBC4014A

PREPARE SIMPLE BUILDING SKETCHES AND DRAWINGS

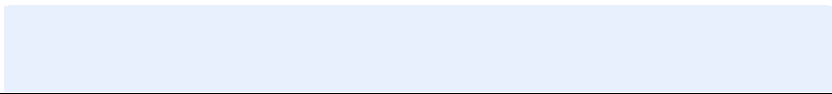
THEORY EXAM INSTRUCTIONS

- This exam will occur under standard assessment conditions.
 - An oral examination may be allowed under certain circumstances. Answers will be documented and FT003 (Oral examination declaration form) must be completed.
- Participants must provide enough detail in their responses to demonstrate their knowledge and skills.
- Please fill in the details below, providing your name, signature and date of assessment.
 - Your signature acknowledges that this is your own work.
- If a participant initially answers a question incorrectly but modifies their response, they must follow the instructions below:
 - If a participant changes their response in writing, they must put their initials next to the written change.
 - If a participant changes their response verbally, this must be noted on the exam paper by the assessor.

Participant name Courtney Stallard

Participant signature 

Assessor name _____

Assessor signature 

Date 16/09/2019

Number of questions	Number of questions answered correctly	Satisfactory?	
		Yes	No
23		☐	☐

ASSESSOR COMMENTS

Q1. Identify three (3) two-dimensional drawings/sketches that may be used to clarify or communicate ideas to clients or other parties. For each drawing/sketch, identify four (4) key features that may be shown.

Answer

Drawing/sketch type	Key features
Floor Plan	Shows the layout/arrangement of rooms and other parts of a house interior
Land boundaries, contours and footprint of building	Shows the layout/arrangement of rooms and other parts of a house interior
Orthographic drawings	Orthographic Projection is a way of representing a 3D object on a piece of paper in a two dimensional format. This means we use several 2D views of the same object to show great detail instead of one single pictorial view. We present these 2D images in orthographic projection as a Plan View (Floor Plan in the case of building structures) and Elevation Views (each face or side of the object seen separately as front, sides and rear views).



Q2. Name two (2) advantages of a three-dimensional sketch/drawing.

Answer

- Clarify or communicate ideas
- Capture design concepts
- Make estimates
- Show measurements



Q3. Name one (1) individual you might contact to establish the scope and standard of the job being undertaken.

Answer ☐ The builder needs to undertake a site visit to establish the scope of the job. They require the following documentation for a site visit:

- The site file containing any existing paperwork
- Any additional forms or documents needed to complete at this visit
- Considered health and safety requirements so you have all the required tools and equipment, not only for measuring and inspecting the job but also for the safety of all people on site

Q4. You need to inspect the relevant area to take measurements for your drawings/sketches. Identify two (2) safety requirements you would need to observe on site.

Answer ☐ -Slope and stability of the ground/soil
-Tripping hazards such tree roots or construction materials
-Sun safety (hat/sunscreen)

Q5. Identify two (2) types of tools/equipment you would use when inspecting the area to take measurements.

Answer ☐ -Tape Measure
-Camera

Q6. Identify two (2) types of tools/equipment you might need when completing sketches/drawings.

Answer ☐ -Clipboard & Paper
-Pen & Scale Ruler

Q7. What action should be taken if any of the tools/equipment identified in Q5. and Q6. are found to be defective? Tick your response.

Answer ☐

Choice	Possible Answers
☐	Report, Record
☐	Stop, Report, Record
☒	Stop, Tag, Report, Record

☐	Stop, Fix, Report, Record
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Q8. True or False (Tick your response): It is best practice to double check measurements before recording them.

Answer

☒	True
☐	False

☐

Q9. Explain the purpose of the scale on sketches/drawings.

Answer

Buildings are drawn in proportion to the actual measurement of the object which is known as the scale of the drawing.

☐

Q10. You have measured a wall that is 2.4m high. Using a scale of 1:100, what size will this be drawn? Provide your answer in mm. Show your workings.

Answer

1mm = 100mm
2.4m = 2400mm
2400/100= 24mm

Answer 24mm
Commonly used building plan symbols
The Australian Architectural Standards details the symbols that must be used in drawings

☐

Q11. Explain the purpose of a key or legend on sketches/drawings.

Answer

A key or legend identifies and explains commonly used building plan symbols. The Australian Architectural Standards details the symbols that must be used in drawings

☐

Q12. Which of the following are true about drawing contours?
Tick all that apply.

Answer	Choice	Possible Answers	☐
	☒	Equally spaced contour lines indicate uniform slope	
	☐	Closely spaced contour lines indicate flat surface	
	☒	Closely spaced contour lines indicate steep ground	
	☒	Concentric closed contours with decreasing values toward the centre indicate a pond	
	☐	Concentric closed contours with decreasing values toward the centre indicate a hill	

Q13. Identify the Volume and Parts of the NCC that relate to metal sheet roof cladding for Classes 1 and 10, and Classes 2 to 9.

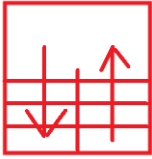
Answer	Classes 1 and 10	Classes 2 to 9	☐
	Table 3.5.1.1a Acceptable Corrosion Protection for sheet roofing	Table 3.5.1.1a Acceptable Corrosion Protection for sheet roofing3.	

Q14. Which Australian Standard is referenced in the NCC with regards to the requirements for the design and installation of metal sheet roof cladding?

Answer	3.5.1.3 Metal Sheet Roofing 2016 NCC 2016 Volume Two Part 3.5 Roof and Wall Cladding Part 3.5.1 Roof Cladding	☐
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Q15. Sketch the following standard design symbols.

Answer	Item	Sketch	☐
	Compass (North)		
	Sink with one bowl		

Stairs	
Toilet	

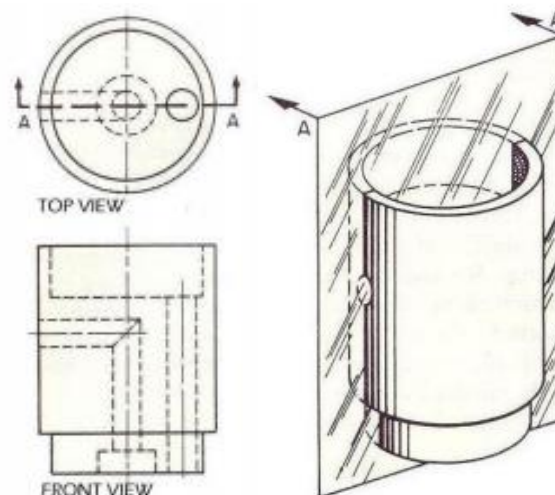
Q16. Explain the meaning of the abbreviations in the table below.

Answer

Abbreviation	Meaning
BK	Brick
CBD / CPD	Cupboard
DP	Downpipe
INSUL	Insulation
KIT	Kitchen
MSB	Main Switchboard
PBD	Plasterboard
RWT	Rainwater Tank
SHR	Shower
TEL	Telephone
WC	Toilet (Water Closet)

☐

Q17. True or False (Tick your response): The dashed/chain lines on the section view shown below represent the portions that have been in contact with the cutting plane.



Source: https://www.mcvts.net/cms/lib/NJ01911694/Centricity/Domain/131/Section_Views.pdf

Answer

☒	True
☐	False

☐

Q18. Explain the use of hatching lines for sectional drawings.

Answer The hatching lines represent the material type in contact with the cutting plane, as illustrated by the key/legend.

☐

Q19. True or False (Tick your response): In an offset sectional drawing, the cutting plane does not travel in a straight line.

Answer

☒	True
☐	False

☐

Q20. Which of the following information should be included in the title block for a sketch/drawing? Tick all that apply.

Answer

Choice	Possible Answers
☒	Client details
☒	Contact details for person who prepared drawings
☒	Date drawing was completed
☒	Drawing number
☒	Drawing title
☒	Job number
☒	Project name and address
☒	Revisions / Amendments (if applicable)
☒	Scale

☐

Q21. True or False (Tick your response): Amendments usually have to be signed or initialled by both the builder and the client to show they both agree.

Answer

☒	True
☐	False

☐

Q22. Explain why it is good practice to have a single repository for sketches/drawings.

Answer It is important to only have a single location to save the Electronic Plans (or keep hard copy hand drawn plans) so that when amendments are made, they are adapted onto the current version of plans. Or if anyone uses plans to quote or set out the building on site, they are working off the latest, correct version.



Q23. Name the Regulation and identify the section that outlines the requirement for structure designers to produce a safety report. Briefly describe the requirements.

Answer	Section of Act	Requirements
	Section 274 of the Work Health and Safety Act (the WHS Act)	An approved code of practice is a practical guide to achieving the standards of health, safety and welfare required under the WHS Act and the Work Health and Safety Regulations (the WHS Regulations). Such as preparing Working Drawings and Engineering.

