



Support turf establishment

AHCTRF204A

By the end of this topic, you should be able to:

- Prepare to establish a planted area
- Prepare the planting area
- Plant turf
- Provide post-planting care
- Monitor turf health
- Complete establishment of the planted area

- Turf is used for a range of purposes, including:
 - Private use (e.g. home gardens)
 - Landscaping
 - High performance (e.g. ovals, parks, sports fields)

- Different types of grass serve different purposes.
- For example:
 - Couch or Queensland Blue are suitable for golf fairways
 - Broadleaf Carpet Grass is suitable for residential lawns and commercial parks

- To prepare for turf establishment, you should familiarise yourself with the following:
 - Task requirements
 - Refer to documentation to determine task requirements
 - The site plan will identify the planting site, planting methods and turf plant species and cultivars, drainage system design, irrigation system design
 - Speak to your supervisor
 - Apply active listening when receiving instructions
 - Clarify any unclear instructions with your supervisor
 - Apply calculations
 - Area (m^2): $L \times W$
 - Volume (m^3): $L \times W \times D$
 - Ratios and application rates

Preparing for turf establishment

- To prepare for turf establishment, you should familiarise yourself with the following:
 - **Workplace information**
 - Identify underground services for the site (e.g. from site plans or contacting Dial Before You Dig)
 - Refer to enterprise guidelines for guidance on the following:

Selecting and using materials, tools, equipment and machinery

Seed spreading

Applying top dressing

Protecting against animals, pedestrians and vehicular traffic

Plant turf

Mowing

Assessment of soil, turf structure and damage

Interlocking sods

Watering

Raking and levelling surfaces

Rolling of planted sites

Reporting information

Treatment of competing plants

Trimming and treatment of turf

Disposal of waste

- To prepare for turf establishment, you should familiarise yourself with the following:
 - Workplace requirements
 - Laws applicable to your workplace, such as:
 - Acts [e.g. *Work Health and Safety Act 2011* (Qld)]
 - Regulations [e.g. *Work Health and Safety Regulation 2011* (Qld)]
 - Codes of Practice [e.g. *How to Manage Work Health and Safety Risks Code of Practice 2011*; *Hazardous Manual Tasks Code of Practice 2011*]

- To prepare for turf establishment, you should familiarise yourself with the following:
 - **Work area**
 - Identify any WHS hazards and assess risks (e.g. underground services, manual handling injuries)
 - Identify environmental hazards (e.g. dust, noise, damage to flora/fauna, waste)
 - Report hazards to your supervisor within a timely fashion – especially emergency situations

- To prepare for turf establishment, you should familiarise yourself with the following:
 - Available PPE, tools and equipment
 - PPE may include: Gloves, wide brimmed hat, work boots
 - Safety equipment may include: Signage and barricades (e.g. witches' hats)
 - Tools and equipment may include: Rake, shovel, tape measure, wheeled lawn level, drum roller, lawn leveller, mower, hose and sprinkler, irrigation components
 - These will be influenced by the turf establishment area design requirements
 - Ensure they are appropriately selected, prepared, calibrated and used for the task
 - Follow manufacturer's specifications (operator's manual)
 - Clarify hygiene practices with supervisor

Preparing the planting area

- When preparing the turf establishment area, you should assess the following soil features:
 - **Compaction**
 - **Nearby plants**
 - Aim to minimise environmental disturbance
 - Remove debris and pollutants (e.g. decaying plant material)
 - Treat competing plants
 - **Depth**
 - Optimum soil depth for a new turf grass area is 200-300mm
 - **Moisture**
 - Water the establishment site according to the planting method
 - **OM level**
 - **pH level**
 - **Tilth**
 - Evenly rake out surface to achieve consistent texture
 - Uniformly level to defined contour requirements
 - Ensure there are adequate fertiliser reserves, measuring and adding as required

Seed propagation

- Undertake the following when establishing turf by seed:
 - Sow seeds by hand and mechanically distribute evenly
 - Ensure there is no overlap of seeds
 - Ensure there is no missed areas
 - Rake or roll the entire sown surface
 - Keep the newly sown area moist until the seed is well-established

Cool season grasses (e.g. tall fescue, creeping bent, perennial ryegrass) are generally established by seed

- Undertake the following when establishing turf by vegetative propagation:
 - Inspect turf material structure
 - Inspect stolons/rhizomes for health and vigour prior to planting
 - Refer to published data, supplier's specifications, industry standards and historical data
 - Discard turf plant material with major defects
 - Trim or treat plant material with minor defects to maintain health and vigour
 - Orient and roll sods onto a moist surface, interlocking into a pattern
 - Ensure the area is covered evenly and efficiently – flat and uniformly
 - Consistently water newly laid turf until roots are established

Warm season grasses (e.g. broadleaf carpet grass, common/hybrid couch, kikuyu, saltine) are generally established by vegetative propagation

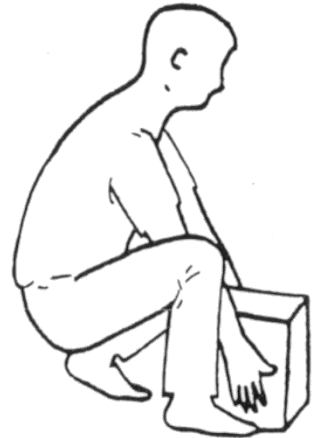
- Be aware of the factors that affect turf growth:
 - Drainage
 - Sports turf should incorporate slit drainage and sand dressing
 - Humidity
 - Sunshine
 - Wind
 - Temperature
 - High soil temperatures can cause death of a germinating seed

Identify, record and report to your supervisor any incorrect planting or situations that will prevent plants from reaching their full potential

- As part of post-planting care, carry out the following:
 - Mow turf to a pattern
 - Ensure the turf has a tight bind to the soil before the first mowing
 - Mow in a regular pattern, making wide turns so not to cause damage
 - Cut to encourage grass to grow horizontally
 - Do not remove more than one-third of the leaf blade
 - Apply top dressing over the whole area, working/rubbing into the surface
 - Undertake watering
 - Water using irrigation system, ensuring dry spots and blockages are addressed and the supervisor notified
 - Water dry or under-watered turf by hand
 - Implement infrequent deep watering
 - Protect the planted site from animals, pedestrian and vehicular traffic

Undertaking turf establishment

- During turf establishment you will be undertaking manual handling tasks
 - Be sure to follow appropriate procedures to avoid injury
- Ensure the following:
 - Neck is upright
 - Back has natural curve
 - Feet are flat and facing the load
 - Shoulders are level
 - Knees are bent
 - Hands have a good grip around the load



- As part of completing turf establishment, you are required to complete the following practices:
 - Clean up the work area
 - Record and/or report your work outcomes to your supervisor
 - Use appropriate paperwork
 - Clearly record your feedback, being mindful of people's varying backgrounds and abilities
 - Shut down, maintain, clean and store plant, tools and equipment
 - Follow manufacturer's specifications
 - Report faults to your supervisor
 - Dispose of materials that cannot be reused or recycled
 - Be environmentally aware and act safely