Alive and kicking
Tanking recommendations for live mud crabs

The Queensland Government has developed best practice guidelines for the handling and storage of mud crabs from harvest to table. These guidelines were developed as a way to reduce the stress levels of muddies, decrease mortality after harvest and to increase the eating quality of the catch.

This fact sheet provides key information on holding live mud crabs in aquariums or tanks.

Tanking crabs

- Recover crabs as per Recovery Procedures Factsheet. This will minimise contamination in your tank’s water.
- Use clean seawater and monitor water quality regularly by checking:
  - temperature (18°C – 25°C)
  - pH (7.9 - 8.1) use sodium bicarbonate to increase
  - salinity (15 - 35ppm)
  - ammonia (<0.1mg/L)
  - nitrate (<50mg/L)
  - nitrite (<0.3mg/L)
- Conduct regular water exchanges as nitrites do not break down readily and will reach toxic levels over time.
- Provide adequate but not vigorous circulation and/or aeration.
- Install a bio-filter to suit the tanks volume/stocking density.
- Cover tank to reduce exposure to light, breeze, evaporation and disturbance.
- Ensure crabs are tied tightly.
- Check all crabs regularly – one dead crab can cause others to die.
- Do not feed crabs as it is unnecessary and may effect water quality.
- Larger storage tanks – as above and:
  - Store crabs in lug baskets lined with shade cloth to stop leg tip damage. Raise baskets 25mm off the tank floor
  - Pack crabs tightly to reduce movement.

Alternate holding systems
Several innovative systems have proved useful.

- Consider a spray tank system. This will:
  - minimise stress to the crabs
  - provide a constant (ambient) temperature
  - produce less maintenance on system
  - provide a fail safe in power outages
  - promote self cleaning of crab waste
  - encourages a low weight loss %
- Install a solid false bottom floor with drainage to a submerged pump.
- A garden irrigation system or similar will create even mist.
- Use saline water for short-term holding.
- Ensure the surface area is large enough to hold crabs stacked a maximum of three high – this enables easy checking for mortalities, reduces crowding and allows adequate exposure to mist.
- Crabs should be covered to reduce exposure to light, breeze, evaporation and disturbance.
- Drain and clean tanks regularly (crab through-put dependent).

More information
John Mayze
Innovative Food Technologies
john.mayze@daff.qld.gov.au
+61 7 3276 6023