

- 2.4; and 1% mortality apply in the population per week; and mean individual weight from samples obtained every 3 weeks)
- Feed 200 g per 10,000 postlarvae
 - Lift feeding tray after 1–3 hours and estimate the feed consumed
 - Feed prawns five times a day for 40 days of culture at 6:00 A.M., 10:00 A.M., 2:00 P.M., 5:00 P.M., and 10:00 P.M. at 20%, 10%, 10%, 35%, and 25%, respectively, of the total feeding ration

Water Management and Aeration

- Replace 10–20% of the water after 30 days of culture from the reservoir ponds
- Allow the water from the reservoir ponds to stay for 4–5 days to replenish the water in the prawn rearing ponds
- Maintain the dissolved oxygen by using six paddle-wheel aerators
- Operate four aerators alternately for 24 hours for intensive culture system for the first 60 days

Diseases

- Aggression or mishandling of prawns causes infection
- Lack of nutrients and vitamins in feeds causes pigment loss in prawns
- Malnutrition in prawns causes “molting death” syndrome

Harvest and Postharvest Handling

- Drain water and collect prawns using the harvest net installed at the pond gate
- Harvest prawns weighing at least 30 g
- Place the harvested prawns in a container then sort according to size and place in boxes with crushed ice to preserve quality



Source:

Philippine Council for Aquatic and Marine Research and Development; Mindanao State University-Naawan; Philippine Council for Agriculture, Forestry and Natural Resources Research and Development. Pond culture of the giant freshwater prawn (*Macrobrachium rosenbergii*): A poster. Los Baños, Laguna: PCAMRD, (undated).

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For more information, please contact:

PCAARRD

Los Baños, Laguna
 Tel. Nos.: (049) 536-0015 to 20
 Fax Nos. (049) 536-0016/536-7922
 Email: pcarrd@pcarrd.dost.gov.ph
 Website: <http://www.pcarrd.dost.gov.ph>



DEPARTMENT OF TRADE & INDUSTRY
BUREAU OF MICRO, SMALL AND MEDIUM
ENTERPRISE DEVELOPMENT (BMSMED)
 5/F, Trade and Industry Building
 361 Sen. Gil J. Puyat Ave. Makati City
 Trunkline No.: 751.0384
 Tel. Nos.: (02) 897.1693 / 897.7596 / 890.4968
 Fax No.: (02) 896.7916 • Email: bmsmed@dti.gov.ph
www.dti.gov.ph



Philippine Council for Agriculture,
Aquatic and Natural Resources Research
and Development (PCAARRD)
 Department of Science and Technology (DOST)



Pond Culture of the Giant Freshwater Prawn (Ulang)

Ulang (*Macrobrachium rosenbergii*)

- Most popular freshwater prawn for commercial culture
- Good alternative for tilapia or tiger prawn culture
- Breeds easily and can reach a marketable size of 3 pieces per kilo in 6–9 months of culture
- Has export potential and an established market niche
- Has polyculture potential and can be cultured in dams, ponds, lakes, cages, and pens

Farm Implements Needed

The basic farm tools in ulang culture are seine and scoop nets, water pump, weighing scale, cutting tools, feeding tray, digging blade, spade, and cast net.



Steps in Culturing Ulang in Ponds

Site Selection

- Adequate quality water source
- Proximity to market
- Flat or gently sloping (1–3%) and safe from flood
- Impervious, clay loam to sandy clay soil with pH 6.5–7.0



Pond Description

- Rectangular surface area (0.5–2.0 hectare)
- Smooth bottom and free from obstructions for seining
- Minimum depth of 60–90 cm at shallow end and a maximum depth of 100–150 cm at deep end
- Bank slope embankment with 30–60 cm freeboard; internal slope of 2.5:1, 3:1, or 4:1; and external of 1.5:1–2.5:1

- Banks with fast growing grass to prevent erosion, and banana, papaya, and palm trees to form as wind breakers

Pond Preparation

- Dry pond
- Eradicate potential competitors, pests, and parasites using teaseed powder (20 ppm). Allow two weeks to eliminate toxins.
- Apply agricultural limestone (if soil pH<6.5)
- Fill the pond with water (1.0–1.2 m) then seal the gates
- Fertilize pond with chicken manure (1,000–2,000 kg/ha) and 16-20-0 (100–200 kg/ha) every two weeks, at a lower dose than the basal rate to sustain the plankton production
- Maintain grass around the pond to prevent soil erosion

Farming Intensity

Extensive systems

- 1–4 postlarvae or juveniles/m²
- Production capacity of less than 500 kg/ha/yr
- Supplemental feeding is not normally supplied
- Organic fertilization rarely applied

Semi-intensive

- 5–20 postlarvae or juveniles/m²
- Production capacity of more than 500 kg/ha/yr
- Balanced feed ration is supplied
- Fertilization used

Intensive

- 21 postlarvae and above/m²
- Production of more than 5,000 kg/ha/yr
- Use of nutritionally complete feed
- Strict control over all aspects of water quality

Stock Management

- Continuous system – continuously stock and select harvestable prawn for market
- Batch system – stock and wait until the stock reaches the average marketable size
- Combined system – combination of 1st and 2nd



Feeding Management

- Feed after stocking
- Broadcast feed around the pond (portion of the feeding ration left in the feeding trays)
- Install four trays measuring 0.25 m² each to monitor the feeds consumed everyday
- During the first 30 days, blind feeding (base feeding schedule on a conversion ratio of