Aceh Aquaculture Rehabilitation Project

Objectives
- 'Hands-on' training / experience for
  - BBAP Ujung Batee staff
  - Dinas Kelautan dan Perikanan staff
- Provide training for collaborating farmers
- Provide sites where other farmers can visit and learn about BMPs
  - from BBAP Ujung Batee staff
  - from other farmers

Demonstration ponds staffing
- Technical linkages to F1S/2005/169
- Technical supervision
  - Supito, BBPBP Jepara

<table>
<thead>
<tr>
<th>Coordinator</th>
<th>BBAP Ujung Batee</th>
</tr>
</thead>
<tbody>
<tr>
<td>Jepara technician</td>
<td>BBPBP Jepara</td>
</tr>
<tr>
<td>Ujung Batee technician</td>
<td>BBAP Ujung Batee</td>
</tr>
<tr>
<td>Dinas staff (PPL)</td>
<td>Dinas Kabupaten</td>
</tr>
<tr>
<td>Farmer</td>
<td></td>
</tr>
</tbody>
</table>
Results – Summary

<table>
<thead>
<tr>
<th>Location</th>
<th>Cycle</th>
<th>Pond</th>
<th>Stocking date</th>
<th>Mortality / harvest</th>
<th>Age (days)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aceh Utara</td>
<td>1</td>
<td>1</td>
<td>4 Jun 08</td>
<td>16 Jun 08</td>
<td>33 d</td>
</tr>
<tr>
<td></td>
<td>2</td>
<td>2</td>
<td>4 Jun 08</td>
<td>24 Jul 08</td>
<td>52 d</td>
</tr>
<tr>
<td></td>
<td>1</td>
<td>1</td>
<td>29 Aug 08</td>
<td>2 Oct 08</td>
<td>35 d</td>
</tr>
<tr>
<td>Bireuen</td>
<td>1</td>
<td>1</td>
<td>17 Mar 08</td>
<td>27 Jul 08</td>
<td>18 w</td>
</tr>
<tr>
<td></td>
<td>2</td>
<td>1</td>
<td>2 Oct 08</td>
<td>21 Oct 08</td>
<td>23 d</td>
</tr>
</tbody>
</table>

Samalanga, Bireuen

Retained wild shrimp
Tested - ve WSSV

P. monodon from BBAP
Ujung Batee
Tested - ve WSSV
Density 10/m²

1,000 milkfish
1,000 Nile tilapia

Water quality

- 27 – 30 °C
- 20 – 26 ppt
Dissolved oxygen

- Low DO’s later in crop
- Pumping / aeration at night and each morning

Shrimp growth

Harvest - shrimp

<table>
<thead>
<tr>
<th>Count</th>
<th>ABW</th>
<th>Quantity (kg)</th>
<th>No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>51</td>
<td>19.4</td>
<td>503.5</td>
<td>25,890</td>
</tr>
<tr>
<td>90</td>
<td>11.1</td>
<td>54.1</td>
<td>4,874</td>
</tr>
<tr>
<td>103</td>
<td>9.7</td>
<td>97.5</td>
<td>10,052</td>
</tr>
</tbody>
</table>

- Survival: 68%
- Feed: 725 kg
- FCR: 1.1:1

Harvest - milkfish

<table>
<thead>
<tr>
<th>ABW</th>
<th>Quantity (kg)</th>
</tr>
</thead>
<tbody>
<tr>
<td>500 g</td>
<td>300 kg</td>
</tr>
<tr>
<td>400 g</td>
<td>255 kg</td>
</tr>
<tr>
<td>350 g</td>
<td>90 kg</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>645 kg</strong></td>
</tr>
</tbody>
</table>

Income

<table>
<thead>
<tr>
<th></th>
<th>Harvest</th>
<th>Income (IDR)</th>
<th>AUD*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Shrimp</td>
<td>655 kg</td>
<td>17,500,000</td>
<td>$1,990</td>
</tr>
<tr>
<td>Milkfish</td>
<td>645 kg</td>
<td>10,000,000</td>
<td>$1,140</td>
</tr>
</tbody>
</table>

* AUD 1 = IDR 8,800; July 2008

Extension and dissemination
Dissemination activities

Farmer field days
- Pond preparation
- Seed selection and stocking
- Pond management

Farmer field days
- Combination of theory and practical

Issues
- Production costs higher in Aceh
  - Milkfish nener IDR 500 – 600 /ekor cf. 150 in Java
  - NaNO₃ IDR 100,000 /kg
- Lack of consistency in BMPs approach
  - e.g. retaining wild shrimp in Bireuen pond
  - Quality control issues
    - Packing of shrimp PLs from BBAP Ujung Batee hatchery
  - PCR testing for WSSV
    - 3 weeks between testing and stocking (PL35)

Future activities
- Need to provide higher-income species than milkfish as alternative
- Options
  - Seabass / barramundi
  - Grouper
    - nursing
    - grow-out
  - Sea cucumbers?

Akhir

Teurimoeng gaseeh ateuh perhatian droeneuh

Terima kasih atas perhatian anda