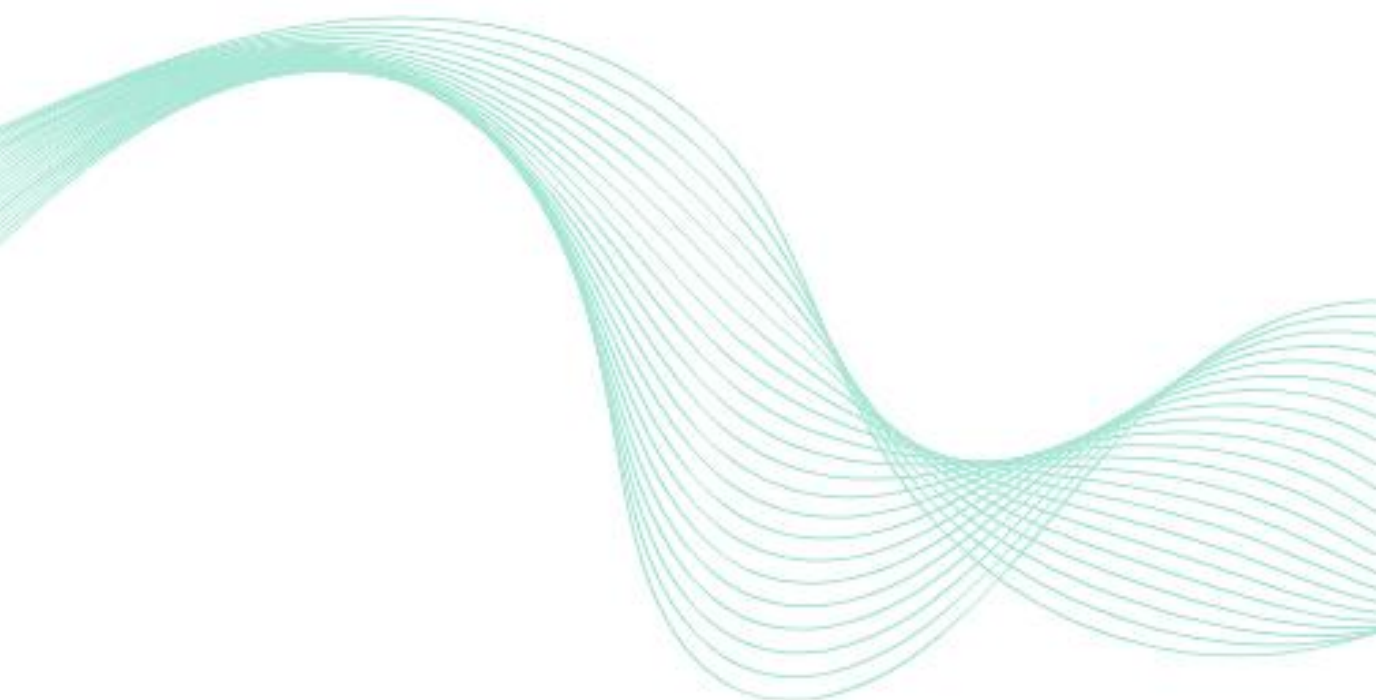




AQUA TOUCH

LABORATORY CO., LTD.



2024 SERVICE CATALOG

About Us

Aqua Touch Laboratory Co. Ltd is a laboratory offering specialized diagnostic services for aquatic animals, pets and livestock. Our mission is to provide standard, accurate, and timely laboratory services, contributing significantly to the enhancement, support, and development of Thailand's aquaculture, pet, and livestock industries.

We are equipped to perform advanced Molecular Biology analysis and provide comprehensive Research Services for testing, research, and molecular biology analyses.

Partner with Aqua Touch Lab Limited for unparalleled diagnostic expertise. Our commitment to precision, expediency, and dependability ensures that every analysis contributes to the progression and prosperity of Thailand's animal sectors.



Our Expertise

In 2024, Aqua Touch Laboratory achieved the proficiency test for offering shrimp disease analysis services from a standardized laboratory (ISO17043), which is a reference laboratory of the World Organization for Animal Health or World Organization for Animals. Health (WOAH)

We are dedicated to improving Examination quality, methods, innovation and technology, as well as additional services. Our goal is to become a laboratory that has obtained standard accreditation. It is recognized and trusted by service users. both domestically and internationally



Aquaculture Pathology Lab
1117 E Lowell Street Room 109
P.O. Box 210090
Tucson, Arizona 85721



World Organisation
for Animal Health
Founded as OIE

WOAH Reference Laboratory for Acute Hepatopancreatic Necrosis Disease,
Infectious Hypodermal and Haematopoietic Necrosis, Necrotising
Hepatopancreatitis, Taura Syndrome and White Spot Disease

FINAL REPORT

4/5/2024

Aqua Touch Laboratory Co. Ltd.

118/135 Pradya-BizHome 2, Ladkrabang Road, Ladkrabang, Bangkok, Thailand, 10520

Email: tanjitti.p@touchlaboratory.com

Thank you for participating in the February 2024 Ring test for PCR laboratories. In the following pages, you will find a summary of your results along with those of 30 other participants. As customary, the laboratories' names have been substituted by a code letter. The letter assigned to your laboratory is the letter "CC". On this occasion, we had the participation of laboratories from 19 countries as follows: Australia (1), Belize (1), Brunei (1), China (1), Colombia (1), Ecuador (2), Guatemala (1), India (4), Italy (1), Malaysia (3), Mexico (2), Panama (1), Peru (1), Saudi Arabia (1), Singapore (1), Thailand (5), Vietnam (1), UAE (1) and US (2).

The pathogens representing a panel of samples you received included Acute hepatopancreatic necrosis disease (AHPND), Decapod penstylidensovirus 1 (IHHNV), Necrotizing hepatopancreatitis bacterium / *Hepatobacter penaei* (NHP-B), White spot syndrome virus (WSSV), Yellow head virus (YHV), *Enterocytozoon hepatopenaei* (EHP), Decapod iridescent virus 1 / shrimp hemocyte iridescent virus (DIV-1/SHIV) and Taura syndrome virus (TSV). The sample sets also included specific pathogen-free (SPF) shrimp tissue. A summary of the results from all of the participants in the ring test is shown in Table 3. The designation "N/A" (Not Analyzed) was used if a laboratory did not test for a particular pathogen. If a sample was reported correctly, the box appears 1/1 or 2/2 to indicate the correct result. If no pathogens were detected in the sample, the designation 0/1 or 2/3, highlighted in red, was used (False negative). If a sample was reported incorrectly, the box appears 2/1, 3/2, or 4/2, highlighted in red, to indicate the incorrect result (False positive). Tables 4 through 12 show summaries of methodology and turnaround times, respectively.






Your laboratory chose to detect the following pathogens: AHPND, WSSV, IHHNV, DIV-1/SHIV, EHP, NHP-B, YHV, and TSV. As you can see in Table 3, your laboratory reported your laboratory reported all selected pathogens correctly. **Congratulations!**



Molecular Biology

Molecular biology disease diagnosis using the Polymerase Chain Reaction (PCR) method.

Polymerase Chain Reaction or PCR is a molecular biology method that can detect infection with high sensitivity and specificity. This PCR method is used to identify genetic material, both DNA and RNA, of various kinds of pathogens, such as Bacteria, viruses, parasites, fungi, worms, etc. The PCR method that the company uses in disease analysis consists of:

-  Conventional PCR
-  Reverse Transcriptase PCR (RT-PCR)
-  Nested and Semi Nested PCR
-  Quantitative PCR or qPCR (Real Time PCR)
-  Quantitative Reverse Transcriptase PCR or qRT-PCR (Real Time PCR)

Shrimp Diseases Testing (1/2)

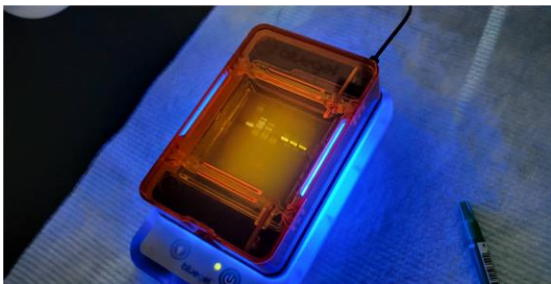
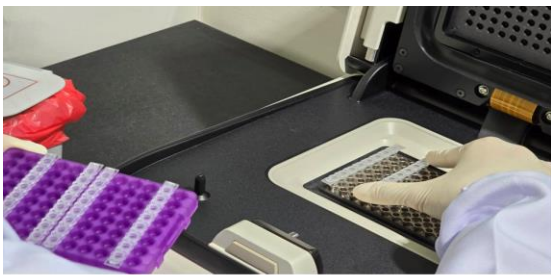
Shrimp pathogens	Method	Specimen	TAT
White Spot Syndrome virus (WSSV)	qPCR	Pleopod, Gill	3 – 5 days
Infectious Hypodermal and Hematopoietic Necrosis Virus (IHHNV)	qPCR	Pleopod, Gill	3 – 5 days
Taura Syndrome Virus (TSV)	qRT-PCR	Pleopod, Gill	3 – 5 days
Yellow Head Virus (YHV)	qRT-PCR	Pleopod, Gill	3 – 5 days
Infectious Myonecrosis Virus (IMNV)	qRT-PCR	Pleopod, Muscle	3 – 5 days
Enterocytozoon Hepatopenaei (EHP)	qPCR	Stomas, Hepatopancreas, Intestine, Feces	3 – 5 days
Acute Hepatopancreatic Necrosis Disease (AHPND) / Early Mortality Syndrome (EMS)	qPCR	Stomas, Hepatopancreas, Intestine, Feces	3 – 5 days
Decapod Iridescent Virus 1 (DIV1)	qPCR	Pleopod, Gill	3 – 5 days
Necrotizing Hepatopancreatitis (NHP)	qPCR	Stomas, Hepatopancreas, Intestine, Feces	3 – 5 days



TAT: Turn Around Time

Shrimp Diseases Testing (2 / 2)

Shrimp pathogens	Method	Specimen	TAT
Translucent Post larva Disease (TPD) / Highly Lethal Vibrio Disease (HLVD)	PCR	Hepatopancreas	3 – 5 days
Glass Post larva Disease (GPD) / Baishivirus	qRT-PCR	Hepatopancreas	3 – 5 days
Convert Mortality Nodavirus (CMNV)	qRT-PCR	Hepatopancreas, Gill	3 – 5 days
Macrobrachium rosenbergii Nodavirus (MrNV)	qRT-PCR	Pleopod, Gill	3 – 5 days
Extra small virus- like particles (XSV)	qRT-PCR	Pleopod, Gill	3 – 5 days



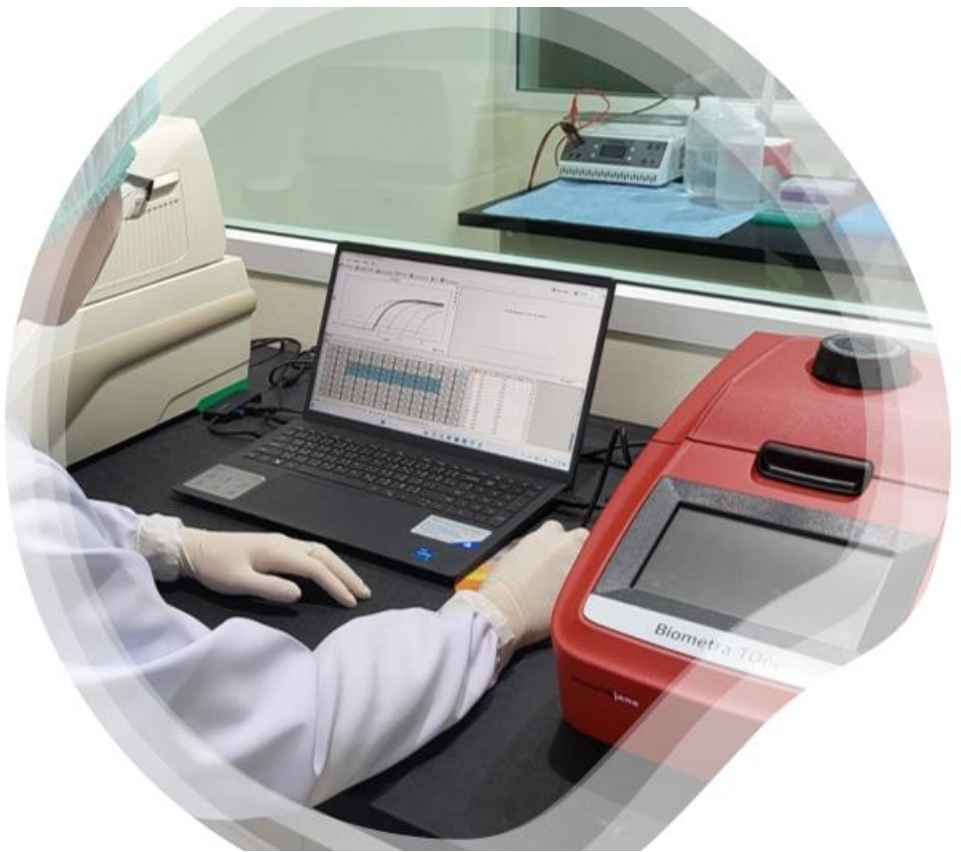
TAT: Turn Around Time

Fish Diseases Testing

Shrimp pathogens	Method	Specimen	TAT
Koi Herpesvirus (KHV)	PCR	Gill, Kidney, Spleen	3 – 5 days
Spring Viraemia of Carp (SVC)	RT-PCR	Gill, Kidney, Brain	3 – 5 days
Tilapia Lake Virus (TiLV)	qRT-PCR	Brain, Liver, Kidney, Mucus	3 – 5 days
Viral Nervous Necrosis (VNN)	qRT-PCR	Brain, Kidney, Eyes	3 – 5 days
Megalocytivirus	qPCR	Spleen, Kidney, Liver	3 – 5 days
Red Sea Bream Iridoviral (RSIV)	PCR	Spleen, Gill	3 – 5 days






TAT: Turn Around Time



Research Service

We offer testing and research services in molecular biology and related fields, such as

-  Analyzing the expression of genes that are relevant or connected to disease control, animal growth, animal breeding, and other topics. (Gene expression analysis)
-  Testing the effectiveness of animal feed, vaccines, and medical supplies in the laboratory analysis section.
-  Other related research

Requesting Our Services

Requesting Our Service

Send request and sample

Contact Aqua Touch Laboratory on how to request our services including test provided, sample type for testing, and service fee.

☎ 02-136-2325, 062-293-3557

✉ admin@touchlaboratory.com

📱 LINE Official by adding the company's LINE ID (@touchlab)

Quotation will be provided including payment details within 1 day after receiving service request form.



Prepare quotation

Payment

Payment for the service can be made via 2 methods.

cash

Internet/ mobile banking transfer

 **Account No. 418-170-3525**
Aqua Touch Laboratory Co., Ltd.

- 🕒 Receipt will be provided within 3 days after confirmation of payment.
- 🕒 The laboratory will begin testing once proof of payment is received.

Prepare receipt

Testing

The laboratory turnaround time is
"3-5 working days" 

Once the tests report has successfully passed inspection and certification is finalized, the results will be accessible for review using the methods previously communicated to the laboratory.



Send result

For more information ☎ 02-136-2325, 062-293-3557

✉ Admin@Touchlaboratory.com

📱 LINE @touchlab

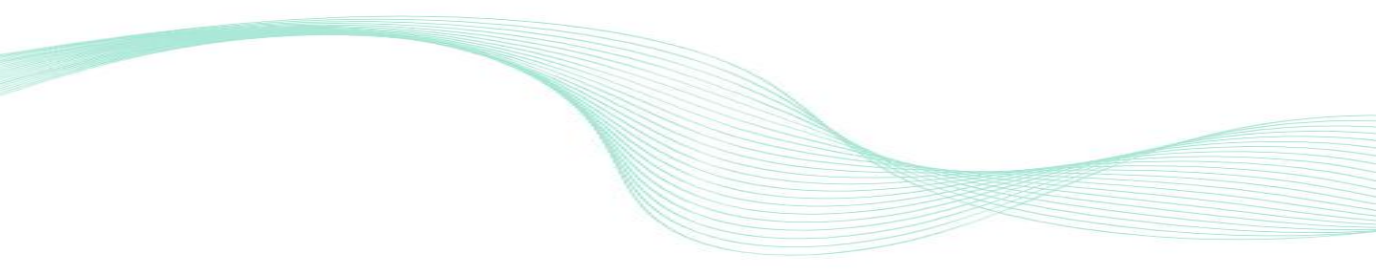
Requesting Our Service

1. Contact Aqua Touch Laboratory on how to request our services including test provided, samples type for testing, and service fee.
Telephone: 02-136-2325, 062-293-3557
Email: admin@touchlaboratory.com
LINE Official by adding the company's LINE ID (@touchlab)
2. To inquire about our services and initiate a service request, please complete the service request form with detailed information about the samples you wish to test. This can be accomplished through several methods, including:
 - Download form From our website: www.touchlaboratory.com
 - Fill out the form through the e-submission system on the website. without having to download the form
 - Request the form via e-mail or Line official
 - Fill out the form and send the sample at our laboratory.
3. Submit your sample to Aqua Touch Laboratory Co., Ltd. either in person or through a courier service, accompanied by the completed service request form.



Requesting Our Service (Cont.)

4. The sample receiver is responsible for verifying the accuracy and completeness of the sample, as well as ensuring that the service request form documents are fully detailed and correct.
5. Inform the requestor of the analysis fee, available payment channels and to submit payment note as evidence of payment. The customer payment receipt will be issued within 1 to 3 days following confirmation.
6. Analysis take approximately 3-5 working days
7. The notification of test results will be carried out in accordance with the procedures outlined in the service request form. The original report will be dispatched to the service requester via mail or made available for personal collection, accompanied by the relevant evidence.



Recommendations for Sample Collection for PCR

The laboratory recommends collecting samples of shrimp, fish, food, soil, and water to test for disease using PCR from each type of sample as follows.

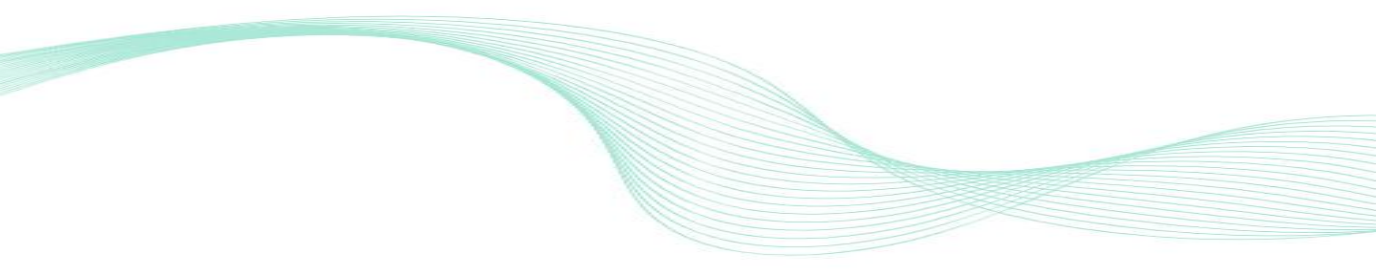
1. Fish and Shrimp

- Shrimp stages included Post larva(PL), Juvenile, and Broodstocks
- Fish stages included Fingerling, Juvenile, and Broodstocks
- Sample may be sent as:
 - Live sample: Place the sample in a plastic bag with clean water and compressed air. Delivered to the laboratory within 24 hours.
 - Chilled/frozen sample: Place the sample in the sample collection tube. Put it in a foam box or a cooling box filled with cooling materials such as dry ice or ice packs and deliver it to our laboratory within 48 hours
 - Sample stored in 95% alcohol: Place sample in sample collection tube. Add alcohol (95% Ethanol) to an amount not less than 10 times the amount of the sample. Use parafilm to wrap tightly around the lid. Placed in a foam box or packaging box for transport. Then deliver it to our laboratory within 48 hours.

** Shrimp and fish in the larval stage is to be deliver as whole body, while teenagers and parents can send as whole body or separate organ parts such as pleopod or feces for disease testing. **

- Clearly label the sample name on the sample tube or bag which **must be the same** as the service request form
- Sample quantity
 - PL shrimp should not be less than 100 PL
 - Juvenile shrimp should not be less than 10 individual
 - Broodstock sample should not be less than 2 pleopods per
 - Feces collected for analysis should be at least 1 gram

Details of the quantity of samples sent for testing of each type of fish Please contact for more information.



Recommendations for Sample Collection for PCR

2. Animal Feeds

- Collect animal feed samples should not be less than 5 grams. Sample should be place in plastic bags or sterile containers which then sent to our laboratory.
- Clearly label the sample name on the sample tube or bag which **must be the same** as the service request form

3. Environmental sample including water and soil.

- Collected soil samples should not be less than 100 grams. Place sample into plastic bags or sterile containers. Sample is to be refrigerated before and during transportation to our laboratory.
- Water sample for testing should not be less than 300 Place sample into plastic bags or sterile containers. Sample is to be refrigerated before and during transportation to our laboratory.
- Clearly label the sample name on the sample tube or bag which **must be the same** as the service request form

Sample Rejection Criteria

Laboratory may reject the specimen incase the sample condition is unsuitable for analysis which may affect the test results. Rejection criteria are as follows:

1. Sample information in the request form is incomplete or not correspond to the sample the laboratory received for testing
2. Sample quantity is lower than our stated quantity for testing
3. The samples submitted for examination are not in a condition suitable for disease testing such as decomposed, rotten, and abnormal odor
4. Sample type does not match disease to be tested
5. Sample delivery and storage temperature does not match with the service request form



Sample Transportation

Sample can send for testing by:

1. Self deliver the sample to Aqua Touch Laboratory Co. Ltd.
2. Samples can be send by express delivery (EMS) with Thailand Post Co., Ltd. or other private transportation company to Aqua Touch Laboratory Co., Ltd. at this address.

Aqua Touch Laboratory Co. Ltd.
118/133 - 135 Pradya BizHome 2, Ladkrabang Road,
Ladkrabang, Ladkrabang, Bangkok 10520
Contact: +66 2 136 2325, +66 62 293 3557



Note: When transporting samples by various methods, the time and temperature of transporting the samples must be taken into account to ensure the test result is not effect.

Payment

- Quotation will be provided including payment detail within 1 days after receiving service request form.
- Payment for the service can be made via cash, internet/mobile banking transfer
- The laboratory will begin testing once proof of payment is received.



Test Report

The laboratory will promptly disclose the results upon completion of the testing and certification process. Once the tests have successfully passed inspection and certification is finalized, the results will be accessible for review using the methods previously communicated to the laboratory.

1. Result is to be deliver via LINE official @touchlab
2. Result send via email

For the issuance of the original report, service requester may contact us to collect the results in person, provided they present the service request form as proof. Alternatively, they may opt to receive the results via postal service.



Contact Us

Aqua Touch Laboratory Co., Ltd.

Telephone: +66 2 136 2325

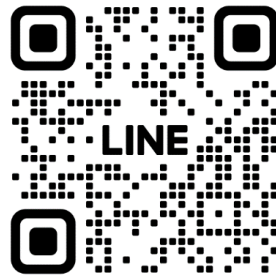
+66 62 293 3557

Email: admin@touchlaboratory.com



Our Website

www.touchlaboratory.com



Our Line Official

@touchlab

Headquarter

Address:

Aqua Touch Laboratory Co. Ltd.

118/133 - 135 Pradya BizHome 2, Ladkrabang Road,
Ladkrabang, Ladkrabang, Bangkok 10520, Thailand

