

YOUR REF. : -  
 DATE RECEIVED : JUL 21, 2010  
 DATE REPORTED: AUG 19, 2010

Certificate No. : **LPAE/0923/10**  
 Company : **Messrs. Pioneerfeed Bioscience Sdn. Bhd.**  
**LIU B2, Precinct 3, Port Klang Free Zone**  
**42920 Pulau Indah, Selangor Darul Ehsan.**

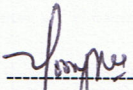
**CERTIFICATE OF ANALYSIS**

One (1) sample said to be **EMERALD E-OIL**, contained in One (1) 500mL. plastic bottle, was received from M/s. Pioneerfeed Bioscience Sdn. Bhd., Pulau Indah, Selangor Darul Ehsan.

On analysis of the sample, the following results were obtained:-

| <u>TEST PARAMETERS</u>        | <u>TEST METHODS</u>  | <u>RESULTS</u> |
|-------------------------------|----------------------|----------------|
| FREE FATTY ACID (AS PALMITIC) | AOCS Ca 5a-40        | 3.68 %         |
| MOISTURE & VOLATILE MATTER    | AOCS Ca 2c-25        | 0.18 %         |
| IMPURITIES                    | AOCS Ca 3a-46        | 0.02 %         |
| IODINE VALUE (WIJ'S)          | AOCS Cd 1d-92        | 52.9           |
| COLOUR                        | AOCS Cc 13e-92       | DARK BROWN     |
| ACID VALUE                    | AOCS Ca 3a-46        | 8.07           |
| PEROXIDE VALUE                | AOCS Cd 8-53         | 3.33 meq/kg    |
| SLIP MELTING POINT            | AOCS Cc 3-25         | 24.0 DEG C     |
| * VITAMIN A                   | CL-TM-01-024 (HPLC)  | 0.04 mg/100g   |
| * VITAMIN E                   | CL-TM-01-002 (HPLC)  | 4.53 mg/100g   |
| <b>FATTY ACID COMPOSITION</b> | <b>AOCS Ce 1e-91</b> |                |
| C6:0                          |                      | 0.1 %          |
| C8:0                          |                      | 1.5 %          |
| C10:0                         |                      | 1.4 %          |
| C12:0                         |                      | 20.4 %         |
| C14:0                         |                      | 7.5 %          |
| C16:0                         |                      | 23.0 %         |
| C18:0                         |                      | 27.8 %         |
| C18:1                         |                      | 13.7 %         |
| C18:2                         |                      | 0.9 %          |
| Others                        |                      | 3.7 %          |

SGS LABORATORY SERVICES (M) SDN. BHD.

  
 WONG YOONG MEI  
 B.Sc. (HONS) AMIC  
 CHEMIST

Pg: 1 of 1

Remark: \* Vitamin A & Vitamin E testing were conducted by third-party lab.

*The Company's involvement has been limited to implementing the Client's instructions, which required the Company to submit the sample(s) for analysis to a third-party laboratory. The Company is not responsible for those analytical results, the responsibility of which remains with the laboratory that produced those results.*

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