

# **FUEL REPORT**

# [WG00681] Machine Id KIOTI DK4210

Component

Diesel Fuel

No.2 DIESEL FUEL (ULTRALOW SULPHUR) (--- GAL

Sample Rating Trend



## DIAGNOSIS

#### Recommendation

Laboratory test indicate that this fuel is suitable for use and meets all test requirements. Resample at the next service interval to monitor.

#### Corrosion

{not applicable}

### Contaminants

The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The water content is negligible. There is no indication of any contamination in the diesel fuel.

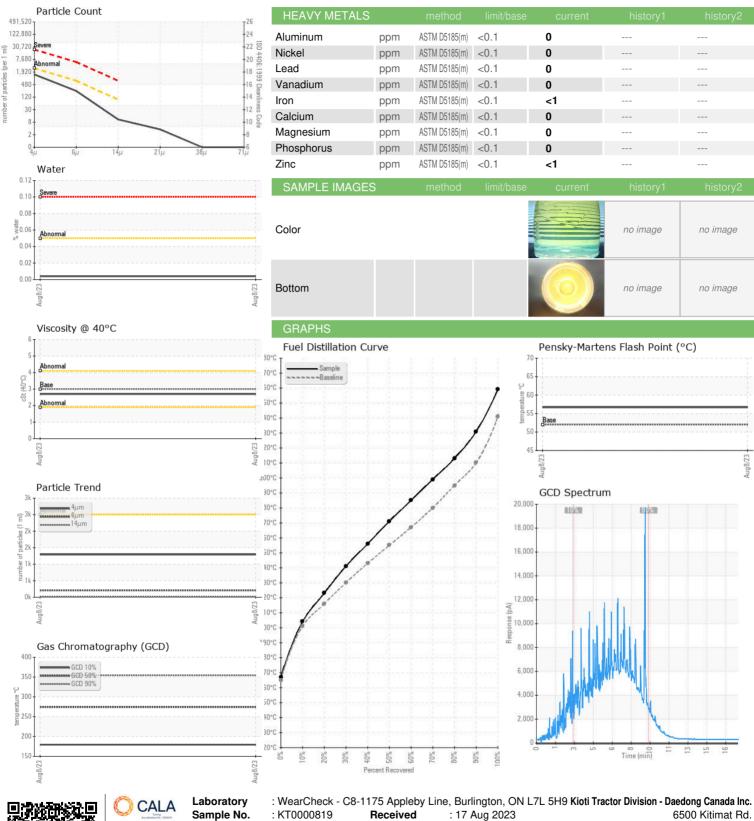
#### **Fuel Condition**

All laboratory tests indicate that this sample meets specifications for No.2 ultra-low-sulfur diesel fuel (US EPA/CGSB-3.517-3 type B).

| R) ( GAL)                  |        |                |            | Aug2023     |          |          |
|----------------------------|--------|----------------|------------|-------------|----------|----------|
| SAMPLE INFORM              | MATION | method         | limit/base | current     | history1 | history2 |
| Sample Number              |        | Client Info    |            | KT0000819   |          |          |
| Sample Date                |        | Client Info    |            | 08 Aug 2023 |          |          |
| Machine Age                | hrs    | Client Info    |            | 0           |          |          |
| Sample Status              |        |                |            | NORMAL      |          |          |
| PHYSICAL PROP              | ERTIES | method         | limit/base | current     | history1 | history2 |
| Specific Gravity           |        | ASTM D1298*    | 0.839      | 0.851       |          |          |
| Fuel Color                 | text   | Visual Screen* | Yllow      | Yllow       |          |          |
| Visc @ 40°C                | cSt    | ASTM D7279(m)  | 3.0        | 2.7         |          |          |
| Pensky-Martens Flash Point | °C     | ASTM D7215*    | 52         | 56.7        |          |          |
| SULFUR CONTE               | NT     | method         | limit/base | current     | history1 | history2 |
| Sulfur                     | ppm    | ASTM D5185(m)  | 10         | 13          |          |          |
| DISTILLATION               |        | method         | limit/base | current     | history1 | history2 |
| Initial Boiling Point      | °C     | ASTM D2887*    | 165        | 167         |          |          |
| 5% Distillation Point      | °C     | ASTM D2887*    |            | 191         |          |          |
| 10% Distill Point          | °C     | ASTM D2887*    | 201        | 204         |          |          |
| 15% Distillation Point     | °C     | ASTM D2887*    |            | 213         |          |          |
| 20% Distill Point          | °C     | ASTM D2887*    | 216        | 223         |          |          |
| 30% Distill Point          | °C     | ASTM D2887*    | 230        | 241         |          |          |
| 40% Distill Point          | °C     | ASTM D2887*    | 243        | 256         |          |          |
| 50% Distill Point          | °C     | ASTM D2887*    | 255        | 271         |          |          |
| 60% Distill Point          | °C     | ASTM D2887*    | 267        | 285         |          |          |
| 70% Distill Point          | °C     | ASTM D2887*    | 280        | 299         |          |          |
| 80% Distill Point          | °C     | ASTM D2887*    | 295        | 313         |          |          |
| 85% Distillation Point     | °C     | ASTM D2887*    |            | 322         |          |          |
| 90% Distill Point          | °C     | ASTM D2887*    | 310        | 331         |          |          |
| 95% Distillation Point     | °C     | ASTM D2887*    |            | 344         |          |          |
| Final Boiling Point        | °C     | ASTM D2887*    | 341        | 359         |          |          |
| IGNITION QUALIT            | ΓΥ     | method         | limit/base | current     | history1 | history2 |
| API Gravity                |        | ASTM D1298*    | 37.7       | 34          |          |          |
| Cetane Index               |        | ASTM D4737*    | <40.0      | 46          |          |          |
| CONTAMINANTS               |        | method         | limit/base | current     | history1 | history2 |
| Silicon                    | ppm    | ASTM D5185(m)  | <1.0       | 0           |          |          |
| Sodium                     | ppm    | ASTM D5185(m)  | < 0.1      | <1          |          |          |
| Potassium                  | ppm    | ASTM D5185(m)  | < 0.1      | 0           |          |          |
| Water                      | %      | ASTM D6304*    | < 0.05     | 0.004       |          |          |
| ppm Water                  | ppm    | ASTM D6304*    | < 500      | 48.9        |          |          |
| FLUID CLEANLIN             | ESS    | method         | limit/base | current     | history1 | history2 |
| Particles >4µm             |        | ASTM D7647     | >2500      | 1292        |          |          |
| Particles >6µm             |        | ASTM D7647     | >640       | 209         |          |          |
| Particles >14µm            |        | ASTM D7647     | >80        | 9           |          |          |
| Particles >21µm            |        | ASTM D7647     | >20        | 3           |          |          |
| Particles >38µm            |        | ASTM D7647     | >4         | 0           |          |          |
| Particles >71µm            |        | ASTM D7647     | >3         | 0           |          |          |
| Oil Cleanliness            |        | ISO 4406 (c)   | >18/16/13  | 17/15/10    |          |          |



## **FUEL REPORT**





ISO 17025:2017 Accredited

Laboratory

Sample No. Lab Number **Unique Number** 

: KT0000819

: 5629659

: 02576599

Diagnosed

: 21 Aug 2023 Diagnostician : Kevin Marson

Test Package : FUEL ( Additional Tests: CC Flash, GC-PercFuel, PrtCount )

Mississauga, ON **CA L5N 2B8** Contact: Rick Dawson rdawson@kiotitractor.com T: (919)374-5100

To discuss this sample report, contact Customer Service at 1-800-268-2131. Test denoted (\*) outside scope of accreditation, (m) method modified, (e) tested at external lab. Validity of results and interpretation are based on the sample and information as supplied.