| REVISION | DATE | DRAWN | ARR. NO. |
|---|---|---|---|
| △1 . | . . | . | * |
| △2 . | . . | . | * |

| KEY NO. | PART NUMBER | PART NAME | MATERIAL | Q'TY | REMARKS |
|---|---|---|---|---|---|

| | | |
|---|---|---|
| 1 POWER (12V) | 13 LIGHTING INPUT | 25 SPRINKLER INPUT |
| 2 KEY SWITCH (ACC) INPUT | 14 PARKING BRAKE INPUT | 26 WORKING LAMP INPUT |
| 3 POWER (GND) | 15 BATTERY WARNING INPUT | 27 VIBRATING INPUT |
| 4 TURN SIGNAL (RH) INPUT | 16 HYD.FILTER WARNING INPUT | 28 LIQUID SPRAY INPUT |
| 5 ENGINE STOP INPUT | 17 ENGINE WARNING INPUT | 29 HIGH BEAM INPUT |
| 6 OVER HEAT INPUT | 18 FUEL SENSOR INPUT | 30 DIAL LIGHTING INPUT |
| 7 FUNCTION SETTING NO.1 | 19 FUNCTION SETTING NO.2 | 31 EXHAUST DEVICE TEMP. INPUT |
| 8 FUNCTION SETTING NO.3 | 20 FUNCTION SETTING NO.4 | 32 UREA WATER LEVEL LOWERING INPUT |
| 9 EXTERNAL ALARM BUZZER OUTPUT | 21 DTC DISPLAY INPUT | 33 PARKED REGENERATION REQUEST INPUT |
| 10 LAMP CHECK INPUT | 22 HOUR METER INPUT | 34 MANUFACTURER TERMINAL |
| 11 CAN (+) | 23 TURN SIGNAL (LH) INPUT | 35 ECO MODE INPUT |
| 12 CAN (-) | 24 ENGINE PREHEAT INPUT | COMBINATION METER |

SPEED SENSOR OPTION
EXACT METER
ROTATORY LAMP OPTION
ROTATORY LAMP SWITCH OPTION
CIS OPTION
OPTION (NO USE)
TURN SIGNAL LAMP (R) (21W) SIDE MARKER LAMP (5W)
HEAD LAMP 60/55W
TURN SIGNAL LAMP (L) (21W) SIDE MARKER LAMP (5W)
TURN SIGNAL SWITCH
FLOOD LAMP 55W
TAIL LAMP (5W) STOP LAMP (21W) TURN SIGNAL LAMP (R) (21W) BACK-UP LAMP (21W)
BACK BUZZER
TAIL LAMP (5W) STOP LAMP (21W) TURN SIGNAL LAMP (L) (21W) BACK-UP LAMP (21W)
FLOOD LAMP 55W
CIGAR
HORN
HORN SWITCH
FLASHER UNIT
HORN RELAY
NEUTRAL POSITION
BACKUP SWITCH
INTERLOCK SWITCH
VIB. GRIP-OFF-AUTO CHANGE SWITCH
LEVER SWITCH
VIB. GRIP-OFF-AUTO CHANGE RELAY
VIB. F-R CHANGE SWITCH
OSC. /VIB. CHANGE SWITCH (For SW774ND)
VIB. LOW-HIGH CHANGE SWITCH (For SW774)
SOLENOID VALVE (R)
SOLENOID VALVE (F)
VIB. FREQ. CHANGE SWITCH (Only SW774)
VIB. FREQ. CHANGE RELAY1
VIB. FREQ. CHANGE RELAY2
PEDAL BRAKE SWITCH
PARKING BRAKE SOL.
PARKING BRAKE RELAY
3000 PUMP SOLENOID VALVE
2500 PUMP SOLENOID VALVE
WATER SPRAY TIMER
WATER SPRAY MODE CHANGE SWITCH
WATER SPRAY RELAY
WATER SPRAY SWITCH (PUMP A)
WATER SPRAY SWITCH (PUMP B)
WATER SPRAY PUMP A
WATER SPRAY PUMP (A) RELAY
WATER SPRAY PUMP B
WATER SPRAY PUMP (B) RELAY
Diode Unit
COOLANT VALVE (1)
COOLANT VALVE (3)
DELIVERY TUBE HEATER (1)
DELIVERY TUBE HEATER (2)
RETURN TUBE HEATER (1)
RETURN TUBE HEATER (2)
SUCTION TUBE HEATER (1)
SUCTION TUBE HEATER (2)
06 TANK HEATER VALVE +
26 TANK HEATER VALVE -
01 DERIVERY LINE HEATER
03 RETURN LINE HEATER
22 SUCTION LINE HEATER
32 BLDC C W
21 BLDC B V
02 BLDC A U
36 XDRP (+5V)
56 UREA PRESSURE
ACU
DEF PUMP UNIT
20 ENCLOSURE HEATER
44 XDRG (0V)
40 CACE-GND
41/46/47/48/49 GND
08 PH INJECTOR +
07 PH INJECTOR -
57 PRE SCR TEMP
DEF INJECTOR (1)
DEF INJECTOR (2)
PRE SCR TEMP SENSOR (1)
PRE SCR TEMP SENSOR (2)
HEATER RELAY
05 HEATER RELAY
31/33 BATT. (for HEATER)
50 BATT. (for HEATER)
10/11/19/29 BATT. (for COMP)
09 MAIN RELAY1
15 MAIN RELAY2
COMP RELAY
OPTION (NO USE)
OPTION RELAY1
INTAKE HEATER
INTAKE HEATER RELAY
ST-SW V12
HEATER RLY V24
STARTER V05
V3800 ECU
ALTERNATOR
STARTER MOTOR
STARTER RELAY
STARTER PRE-RELAY
ECU MAIN RELAY
BATTERY RELAY
12V MF-D31R
12V MF-D31R
STARTER KEY
VIB. THROTTLE RELAY
THROTTLE SWITCH
HAZARD SWITCH
LIGHT L-H SWITCH
LIGHTING SWITCH
FLOOD LAMP SWITCH
COMBINATION METER
DTC SWITCH
HYD. FILTER SWITCH
FUEL UNIT
PARKING SWITCH
NEUTRAL RELAY
PARKING INTERLOCK RELAY
V27 OVERHEAT LAMP
V07 HEATER LAMP
V08 STOP LAMP
V09 WARNING LAMP
V75 PARKING SW.
V74 DPF INHIBIT SW.
V56 DPF SW.
V30 N-SW.
V3800 ECU
RESISTOR (120Ω) ENG. ACC
RESISTOR (120Ω)
SERVICE TOOL
DPF SWITCH
FUEL PUMP
SPEED PULSE ON/OFF RELAY
SPEED SENSOR V14
TACHMETER PULSE V34
RATED SPD SELECT SW V11
BG MODE SW V76
IGNITION SWITCH 18
ACU
E/G CONNECTOR
AIR FLOW SENSOR
V3800 ECU

| | | | |
|---|---|---|---|
| SHIELD GND A01 | E01 INTAKE THRO. (+) | INJ1-COM (4) B02 | E14/E34 INJ COMMON |
| EGR VALVE (3) A02 | E07 PCV1 | INJ4-COM (1) B05 | |
| INTAKE THRO. (5) A04 | E27 PCV1 | INJ1-DRV (9) B08 | E15/E35 INJ DRVTWV1 |
| EGR VALVE (4) A06 | E06 COM3 | INJ4-DRV (6) B11 | E16/E36 INJ DRVTWV3 |
| PCV (2) A03 | E26 COM3 | INJ3-COM (2) B04 | E18/E38 INJ COMMON |
| PCV (1) A07 | E11 PRV | INJ2-COM (3) B03 | |
| PRV (1) A11 | E32 PRV | INJ2-DRV (8) B09 | E20/E40 INJ DRVTWV4 |
| PRV (2) A10 | E21 INTAKE THRO. (-) | INJ3-DRV (7) B10 | E19/E39 INJ DRVTWV2 |
| INTAKE THRO. (6) A08 | E77 A-GND4 | SHIELD GND B06 | E55 SLD-GND |
| SENSOR BOOST (1) A09 | V50 A-VCC10 (+5V) | SHIELD GND B12 | |
| INTAKE THRO. (3) A17 | V48 INTAKE THROTTLE | | |
| INTAKE THRO. (4) A22 | V65 A-GND11 | | |
| CAM SHAFT SNSR (3) A14 | E53 G-VCC | | |
| CAM SHAFT SNSR (2) A40 | E54 G-GND | | |
| CAM SHAFT SNSR (1) A23 | E73 G-SIG | | |
| CRANK SHAFT SNSR (2) A18 | E75 NE-GND | | |
| CRANK SHAFT SNSR (1) A15 | E52 NE (12) -SIG | | |
| CRANK SHAFT SNSR (3) A19 | | | |
| RAIL PRESSURE (3) A39 | E78 A-GND6 | | |
| RAIL PRESSURE (2) A28 | E49/E68 PFUEL1/2 | | |
| RAIL PRESSURE (1) A26 | E13 A-VCC1 | | |
| EGR VALVE (1) A36 | | | |
| EGR VALVE (2) A31 | | | |
| COOLANT TEMP (2) A13 | E76 A-GND2 | | |
| OIL SW (1) A21 | V29 OIL-SW | | |
| INTAKE TEMP (1) A29 | E47 INTAKE AIR TEMP | | |
| INTAKE TEMP (2) A30 | E56 A-GND1 | | |
| SENSOR BOOST (2) A33 | E67 BOOST SENSOR | | |
| COOLANT TEMP (1) A38 | E66 COOLANT TEMP | | |
| SENSOR BOOST (3) A41 | E33 A-VCC2 | | |
| | V39/V79/V80/V59 GND | | |
| | V20 CASE GND | | |
| | V40/V60 SIGNAL GND | | |

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|---|---|---|---|
| DPF SEN. T2 (2) | E43 OUTLET DPF | AIR FLOW (-) (5) | V45 A-GND10 |
| DPF SEN. T2 (1) | E57 A-GND3 | AIR FLOW (+) (4) | V49 INTAKE TEMP |
| DPF SEN. T1 (2) | E63 OUTLET DOC | AIR FLOW VO (3) | E69 AFS-SIG |
| DPF SEN. T1 (1) | | AIR FLOW GND (2) | |
| DPF SEN. T0 (2) | E44 INLET DOC | AIR FLOW POW. (1) | |
| DPF SEN. T0 (1) | | | |
| DPF DIFFSEN. (3) | E45 DIFF SEN. SIG. | | |
| DPF DIFFSEN. (2) | | | |
| DPF DIFFSEN. (1) | V71 A-VCC12 (MAX10mA) | | |

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|---|---|---|---|
| CAN1-LO 16 | 0.5Br | CAN2-LO 27 | 0.5RB |
| CAN1-HI 17 | 0.5BrW | CAN2-HI 28 | 0.5RW |

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|---|---|---|---|---|---|---|---|
| | B | R1 | R2 | ACC | BR | C |
| R1 | | | | | | |
| OFF | | | | | | |
| ACC | | | | | | |
| ST | | | | | | |

| | | | |
|---|---|---|---|
| PART NAME | | MATERIAL | Q'TY / MASS kg |
| DATE | JUL. 13. 2019 | MODEL | 439 |
| DRAWN | T. KUROSU | | ELECTRIC WIRING DIAGRAM |
| DESIGN | T. KUROSU | SCALE | FREE |
| CHKD. | | PART NUMBER | 0439-99002-0 |
| APP. | T. KUROSU | DRAWING NUMBER | -10371-0 |

SAKAI HEAVY INDUSTRIES, LTD.

(PREVIOUS NO. - - )