

# Shop Manual

BULLDOZER

***D61EX -24E0***  
***D61PX -24E0***

SERIAL NUMBERS    D61EX-41275    and up  
                                 D61PX-41275



---

# 00 INDEX AND FOREWORD

---

# INDEX

00 INDEX AND FOREWORD .....	00-1
ABBREVIATION LIST .....	00-19
FOREWORD, SAFETY, BASIC INFORMATION .....	00-25
HOW TO READ THE SHOP MANUAL.....	00-25
SAFETY NOTICE FOR OPERATION.....	00-27
PRECAUTIONS TO PREVENT FIRE.....	00-35
ACTIONS IF FIRE OCCURS .....	00-37
PRECAUTIONS FOR DISPOSING OF WASTE MATERIALS .....	00-38
ACTIONS TAKEN TO MEET EXHAUST GAS REGULATIONS.....	00-39
PRECAUTIONS FOR DEF.....	00-40
STORE AdBlue/DEF .....	00-41
PRECAUTIONS FOR HANDLING HYDRAULIC EQUIPMENT .....	00-42
PRECAUTIONS FOR DISCONNECTION AND CONNECTION OF PIPINGS.....	00-45
PRECAUTIONS FOR HANDLING ELECTRICAL EQUIPMENT.....	00-52
PRECAUTIONS FOR HANDLING FUEL SYSTEM EQUIPMENT .....	00-54
PRECAUTIONS FOR HANDLING INTAKE SYSTEM EQUIPMENT .....	00-55
PRACTICAL USE OF KOMTRAX .....	00-56
DISCONNECT AND CONNECT PUSH-PULL TYPE COUPLER .....	00-57
PRECAUTIONS FOR DISCONNECTION AND CONNECTION OF CONNECTORS .....	00-61
METHOD FOR DISCONNECTING AND CONNECTING DEUTSCH CONNECTOR .....	00-65
METHOD FOR DISCONNECTING AND CONNECTING SLIDE LOCK TYPE CONNECTOR .....	00-66
METHOD FOR DISCONNECTING AND CONNECTING CONNECTOR WITH LOCK TO PULL ...	00-68
METHOD FOR DISCONNECTING AND CONNECTING CONNECTOR WITH LOCK TO PUSH ..	00-69
METHOD FOR DISCONNECTING AND CONNECTING CONNECTOR WITH HOUSING TO ROTATE .	00-71
HOW TO READ ELECTRICAL WIRE CODE .....	00-72
EXPLANATION OF TERMS FOR MAINTENANCE STANDARD.....	00-76
STANDARD TIGHTENING TORQUE TABLE.....	00-79
CONVERSION TABLE .....	00-86
01 SPECIFICATIONS .....	01-1
CONTENTS .....	01-2
ABBREVIATION LIST .....	01-3
SPECIFICATIONS .....	01-9
SPECIFICATION DRAWING .....	01-9
SPECIFICATIONS .....	01-13
WEIGHT TABLE .....	01-22
TABLE OF FUEL, COOLANT, AND LUBRICANTS .....	01-26
10 STRUCTURE AND FUNCTION .....	10-1
CONTENTS .....	10-2
ABBREVIATION LIST .....	10-5
UREA SCR SYSTEM.....	10-11
LAYOUT DRAWING OF UREA SCR SYSTEM .....	10-11
UREA SCR SYSTEM DIAGRAM .....	10-14
FUNCTION OF UREA SCR SYSTEM.....	10-15
COMPONENT PARTS OF UREA SCR SYSTEM.....	10-31
BOOT-UP SYSTEM .....	10-40
LAYOUT DRAWING OF BOOT-UP SYSTEM.....	10-40
SYSTEM OPERATING LAMP SYSTEM .....	10-41
BATTERY DISCONNECT SWITCH .....	10-43
ENGINE SYSTEM .....	10-45
LAYOUT DRAWING OF ENGINE SYSTEM.....	10-45
ENGINE CONTROL SYSTEM .....	10-47
AUTOMATIC IDLE STOP SYSTEM .....	10-53
COMPONENT PARTS OF ENGINE SYSTEM .....	10-56
COOLING SYSTEM.....	10-75
LAYOUT DRAWING OF COOLING SYSTEM .....	10-75

COOLING FAN CONTROL SYSTEM.....	10-77
COMPONENT PARTS OF COOLING SYSTEM.....	10-80
CONTROL SYSTEM.....	10-90
LAYOUT DRAWING OF CONTROL SYSTEM .....	10-90
MACHINE MONITOR SYSTEM .....	10-91
KOMTRAX SYSTEM.....	10-92
COMPONENT PARTS OF CONTROL SYSTEM.....	10-93
HYDRAULIC SYSTEM.....	10-126
LAYOUT DRAWING OF HYDRAULIC SYSTEM .....	10-126
CLSS .....	10-127
COMPONENT PARTS OF HYDRAULIC SYSTEM .....	10-130
POWER TRAIN SYSTEM .....	10-165
LAYOUT DRAWING OF HST SYSTEM .....	10-165
OPERATION OF HST SYSTEM.....	10-166
STEERING AND BRAKE CONTROL SYSTEM .....	10-168
HST CONTROL SYSTEM.....	10-170
PARKING BRAKE CONTROL SYSTEM .....	10-181
COMPONENT PARTS OF POWER TRAIN SYSTEM.....	10-184
WORK EQUIPMENT SYSTEM .....	10-221
WORK EQUIPMENT CONTROL .....	10-221
LAYOUT DRAWING OF FRONT WORK EQUIPMENT .....	10-224
LAYOUT OF FIXED MULTI-SHANK RIPPER.....	10-225
COMPONENT PARTS OF WORK EQUIPMENT SYSTEM.....	10-226
UNDERCARRIAGE AND FRAME.....	10-245
MAIN FRAME .....	10-245
SUSPENSION .....	10-246
TRACK FRAME AND IDLER CUSHION .....	10-249
WORK EQUIPMENT.....	10-252
STRUCTURE OF FRONT WORK EQUIPMENT.....	10-252
STRUCTURE OF FIXED MULTI-SHANK RIPPER.....	10-253
CAB AND ITS ATTACHMENTS .....	10-254
ROPS CAB .....	10-254
CAB MOUNT .....	10-256
20 STANDARD VALUE TABLE .....	20-1
CONTENTS .....	20-2
ABBREVIATION LIST .....	20-3
STANDARD VALUE TABLE FOR ENGINE .....	20-9
STANDARD VALUE TABLE FOR ENGINE: D61EX-24E0.....	20-9
STANDARD VALUE TABLE FOR ENGINE: D61PX-24E0.....	20-13
STANDARD VALUE TABLE FOR MACHINE.....	20-17
STANDARD VALUE TABLE FOR MACHINE: D61EX-24E0.....	20-17
STANDARD VALUE TABLE FOR MACHINE: D61PX-24E0.....	20-33
MACHINE POSTURE AND PROCEDURE FOR MEASURING PERFORMANCE .....	20-49
30 TESTING AND ADJUSTING.....	30-1
CONTENTS .....	30-2
ABBREVIATION LIST .....	30-5
RELATED INFORMATION ON TESTING AND ADJUSTING .....	30-11
TOOLS FOR TESTING AND ADJUSTING.....	30-11
SKETCH OF TOOLS FOR TESTING AND ADJUSTING .....	30-18
ENGINE AND COOLING SYSTEM.....	30-19
TEST ENGINE SPEED .....	30-19
TEST BOOST PRESSURE.....	30-22
TEST EXHAUST GAS COLOR.....	30-24
TEST AND ADJUST VALVE CLEARANCE.....	30-28
TEST COMPRESSION PRESSURE.....	30-30
TEST BLOWBY PRESSURE .....	30-35
TEST ENGINE OIL PRESSURE .....	30-38
TEST EGR VALVE AND VGT OIL PRESSURE .....	30-39

It's a preview. You can download the full file by clicking the link below.

<https://shopservicemanual.com/>

Service Manuals from 2\$