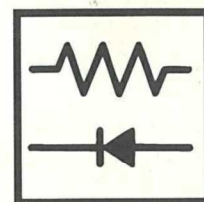


Mazak

QUICK TURN NEXUS II
100/150/200/250/300/350

MANUAL NO. DD311080004A

ELECTRIC WIRING DIAGRAM





ELECTRICAL CIRCUIT DIAGRAMS

QUICK TURN NEXUS II
100/150/200/250/300/350

MANUAL NO. DD311080004A

MANUAL NO.

ELEMENTARY DIAGRAM LIST

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SET No. : DD311080004

No.	ITEM	SPECIFICATION
1	MACHINE TYPE	QTN100/150/200/250/300/350
2	MACHINE No.	JPN/YMC/YME
3	CNC TYPE	Matrix-Nexus
4	PLC ROM No.	
5	AUX ROM No.	
6	SPINDLE 1 TYPE	QTN100 : SJ-4B6610TK QTN150 : SJ-4B6612TK
7	SPINDLE 1 TYPE	QTN200 (JPN) : SJ-4B6714TK QTN200 (EX) : SJ-4B6712TK
8	SPINDLE 1 TYPE	QTN250 : SJ-4B6712TK QTN300/350 : SJ-4B6913TK
9		
10		

APR' D BY	CHK' D BY	DRWN BY
QTN-MP-IVS  '07.07.25 S. ITO	QTN-MP-IVS  '07.07.25 T. OKUTSU	QTN-MP-IVS  '07.07.25 S. BANNO

Remarks

(*1) EXCHANGED DD311080000
(*2) EXCHANGED DD311080001
(*3) EXCHANGED DD311080002
(*4) EXCHANGED DD311080003

Option

No.	DRAWING NUMBER	TITLE
1	311080100011	ELECTRICAL CAPACITY LIST (*4)
2	311080100212	BLOCK LINE DRAWING (QTN100/150 JPN) (*3)
3	311080100222	BLOCK LINE DRAWING (QTN100/150 YMC) (*3)
4	311080100232	BLOCK LINE DRAWING (QTN100/150 YME) (*3)
5	311080100242	BLOCK LINE DRAWING (QTN200/250 JPN) (*3)
6	311080100252	BLOCK LINE DRAWING (QTN200/250 YMC) (*3)
7	311080100262	BLOCK LINE DRAWING (QTN200/250 YME) (*3)
8	311080100272	BLOCK LINE DRAWING (QTN300/350 JPN) (*3)
9	311080100282	BLOCK LINE DRAWING (QTN300/350 YMC) (*3)
10	311080100292	BLOCK LINE DRAWING (QTN300/350 YME) (*3)
11	311080100361	BUS LINE (*1)
12	311080100371	REMOTE I/O CONNECTION (*3)
13	311080100510	PLC PARAMETER (TIM1-TIM64) (*1)
14	311080100520	PLC PARAMETER (TIM65-TIM128) (*1)
15	311080100530	PLC PARAMETER (TIM129-TIM168) (*1)
16	311080100540	PLC PARAMETER (RS1-RS64) (*1)
17	311080100550	PLC PARAMETER (RS65-RS128) (*1)
18	311080100560	PLC PARAMETER (RS129-RS168) (*1)
19	311080100570	PLC PARAMETER (RL1-RL64) (*1)
20	311080100580	PLC PARAMETER (RB1-RB8) (*1)
21	311080100590	PLC PARAMETER (RB9-RB16) (*1)
22	311080100600	PLC PARAMETER (RB17-RB24) (*1)
23	311080100610	PLC PARAMETER (RB25-RB32) (*1)
24	311080100620	PLC PARAMETER (RB33-RB40) (*1)
25	311080100630	PLC PARAMETER (RB41-RB48) (*1)

ELEMENTARY DIAGRAM LIST

SET No. : DD311080004

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No.	DRAWING NUMBER	TITLE
26	311080100640	PLC PARAMETER (RB49-RB56) (*1)
27	311080100650	PLC PARAMETER (RB57-RB64) (*1)
28	311080100660	PLC PARAMETER (RB65-RB72) (*1)
29	311080100670	PLC PARAMETER (RB73-RB80) (*1)
30	311080100680	PLC PARAMETER (RB81-RB88) (*1)
31		
32	311080300010	MACHINE COMPONENTS LAYOUT (QTN100) (1) (*2)
33	311080300020	MACHINE COMPONENTS LAYOUT (QTN100) (2) (*2)
34	311080300030	MACHINE COMPONENTS LAYOUT (QTN100) (3) (*2)
35	311080300040	MACHINE COMPONENTS LAYOUT (QTN100) (4) (*2)
36	311080300110	MACHINE COMPONENTS LAYOUT (QTN200) (1) (*1)
37	311080300120	MACHINE COMPONENTS LAYOUT (QTN200) (2) (*1)
38	311080300130	MACHINE COMPONENTS LAYOUT (QTN200) (3) (*1)
39	311080300140	MACHINE COMPONENTS LAYOUT (QTN200) (4) (*1)
40	311080300210	MACHINE COMPONENTS LAYOUT (QTN300) (1) (*2)
41	311080300220	MACHINE COMPONENTS LAYOUT (QTN300) (2) (*2)
42	311080300230	MACHINE COMPONENTS LAYOUT (QTN300) (3) (*2)
43	311080300240	MACHINE COMPONENTS LAYOUT (QTN300) (4) (*2)
44	311080300310	MACHINE COMPONENTS LAYOUT (HYDR. PUMP) (*1)
45	311080300330	MACHINE COMPONENTS LAYOUT (AIR KIT) - (*2)
46	311080300340	MACHINE COMPONENTS LAYOUT (AIR KIT) (*1)
47		
48	311080400010	LINE POWER SUPPLY (JPN)
49	311080400020	LINE POWER SUPPLY (YMC/OTH)
50	311080400030	LINE POWER SUPPLY (YME)
51	311080400060	POWER SUPPLY UNIT
52	311080400080	MAIN SPINDLE DRIVE
53	311080400091	MAIN SP. FEED BACK (*1)
54	311080400111	X-AXIS SERVO MOTOR (*1)
55	311080400121	X-AXIS SERVO FEED BACK (*1)
56	311080400131	Z-AXIS SERVO MOTOR & FEED BACK (*1)
57	311080400152	TURRET DRIVE (*2)
58	311080400161	NC TAIL DRIVE (QTN100/150/200/250) (*1)
59	311080400171	NC TAIL DRIVE (QTN300/350) (*1)
60	311080400210	HYDRAULIC PUMP MOTOR

ELEMENTARY DIAGRAM LIST

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No.	DRAWING NUMBER	TITLE
61	311080400220	HEAD COOLING FAN (QTN100 SERIES)
62	311080400230	HEAD COOLING FAN (QTN200/300 SERIES)
63	311080400240	HEAD COOLING PUMP (QTN200/300 SERIES)
64	311080400250	HEAD COOLING FAN (QTN200/300 SERIES)
65	311080400271	COOLANT PUMP MOTOR (*1)
66	311080400310	CHIP CONVEYOR (OP.)
67	311080400321	MIST COLLECTOR (OP.) (*1)
68	311080400330	COOLANT CHILLER (OP.)
69	311080400350	GREASE PUMP MOTOR
70	311080400360	LUBE PUMP MOTOR & SENSOR
71	311080400370	TOOL EYE (1) (JPN:OP. EX.:STD.)
72	311080400380	TOOL EYE (2) (JPN:OP. EX.:STD.)
73	311080400390	CONTROL BOX & AMP COOLING FAN
74	311080400411	AC100V/DC24V CONTROL (*1)
75	311080400420	EMERGENCY STOP CIRCUIT (1)
76	311080400430	EMERGENCY STOP CIRCUIT (2)
77	311080400440	EMERGENCY STOP CIRCUIT (3)
78	311080400460	DOOR INTERLOCK CIRCUIT (1)
79	311080400471	DOOR INTERLOCK CIRCUIT (2) (*1)
80	311080400510	DC24V SUPPLY TO NC DI/O
81	311080400520	REMOTE I/O COMMON LINE
82	311080400530	REMOTE I/O COMMON LINE (OPTION)
83	311080400540	REMOTE I/O COMMON LINE (WORK REST OP.)
84	311080400570	MAIN SPINDLE CHUCK
85	311080400581	SOLENOID VALVES (*1)
86	311080400590	AIR PRESSURE SW.
87	311080400600	WORK LIGHT
88	311080400640	OPERATING BOX
89	311080400661	OPERATING BOX INPUT (1) (*1)
90	311080400670	OPERATING BOX INOUT (2)
91	311080400680	OPERATING BOX INPUT (3)
92	311080400690	OPERATING BOX INPUT (4)
93	311080400700	OPERATING BOX OUTPUT
94	311080400720	NETWORK I/F
95	311080400750	THERMOMETER ANALOG INPUT

ELEMENTARY DIAGRAM LIST

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No.	DRAWING NUMBER	TITLE
96	311080400760	MMS INTERFACE DIAGRAM (OP.)
97	311080400770	MAIN BREAKER SHUNT TRIP
98	311080400780	ALARM CIRCUIT
99	311080400830	WORK REST (OP.)
100	311080400840	ADDITIONAL M CODE (OP.)
101	311080400850	AUTO PARTS CATCHER (OP.)
102	311080400860	AUTO DOOR (OP.)
103	311080400870	AUTO DOOR SENSOR (1) (QTN100/200) (OP.)
104	311080400880	AUTO DOOR SENSOR (2) (QTN300) (OP.)
105	311080400900	INDICATOR LIGHT (OP.)
106	311080400910	AUTO POWER ON/OFF & WARM UP (OP.)
107	311080400920	WORK CONVEYOR (OP.)
108	311080400940	INVERTER CHIP CONVEYOR I/F (OP.)
109	311080400950	MAGNUM COOLANT I/F (OP.)
110	311080400960	DRAW UP PUMP MOTOR (MAGNUM COOLANT OP.)
111	311080400970	HIGH PRS. COOLANT (1) (SUPER FLOW USA)
112	311080400980	HIGHT PRS. COOLANT (2) (SUPER FLOW USA)
113	311080401001	IKURA BAR FEEDER I/F S TYPE (OP.) (*3)
114	311080401010	IKURA BAR FEEDER I/F (OP.)
115	311080401020	ALPS BAR FEEDER I/F (1) (OP.)
116	311080401030	ALPS BAR FEEDER I/F (2) (OP.)
117	311080401040	YMUKE CYCLE BAR FEEDER I/F (1) (OP.)
118	311080401050	YMUKE CYCLE BAR FEEDER I/F (2) (OP.)
119	311080401060	LNS BAR FEEDER I/F (1) (OP.)
120	311080401070	LNS BAR FEEDER I/F (2) (OP.)
121	311080401080	LNS BAR FEEDER I/F (3) (OP.)
122	311080401090	LNS BAR FEEDER I/F (4) (OP.)
123	311080401100	LNS BAR FEEDER I/F (5) (OP.)
124	311080401201	REMOTE TERMINAL KIT MAZA-CARE TYPE 1 (*4)
125	311080401210	Mazak IHC NEKUST ESI (*4)
126		
127		
128		
129		
130		

ELEMENTARY DIAGRAM LIST

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No.	DRAWING NUMBER	TITLE
131	311080500010	PARTS ARRANGEMENT ON CONTROL BOX (QTN100/150)
132	311080500020	PARTS ARRANGEMENT ON AMP PANEL (QTN100/150) (*2)
133	311080500030	PARTS ARRANGEMENT ON POWER PANEL (QTN100/150) (*2)
134	311080500040	PARTS ARRANGEMENT ON POWER PANEL (QTN100/150) (*2)
135	311080500050	PARTS ARRANGEMENT ON PCB PANEL (QTN100/150) (*2)
136	311080500060	PARTS ARRANGEMENT ON PCB PANEL (QTN100/150) (*2)
137	311080500071	PARTS ARRANGEMENT ON BASE PANEL (QTN100/150) (*3)
138	311080500081	PARTS ARRANGEMENT ON BREAKER BOX (QTN100/150) (*3)
139		
140	311080500110	PARTS ARRANGEMENT ON CONTROL BOX (QTN200/250) (*1)
141	311080500120	PARTS ARRANGEMENT ON AMP PANEL (QTN200/250) (*1)
142	311080500130	PARTS ARRANGEMENT ON POWER PANEL (QTN200/250) (*1)
143	311080500140	PARTS ARRANGEMENT ON POWER PANEL (QTN200/250) (*1)
144	311080500150	PARTS ARRANGEMENT ON PCB PANEL (QTN200/250) (*1)
145	311080500161	PARTS ARRANGEMENT ON PCB PANEL (QTN200/250) (*3)
146	311080500171	PARTS ARRANGEMENT ON BASE PANEL (QTN200/250) (*3)
147	311080500181	PARTS ARRANGEMENT ON BREAKER BOX (QTN200/250) (*3)
148		
149	311080500210	PARTS ARRANGEMENT ON CONTROL BOX (QTN300/350) (*1)
150	311080500220	PARTS ARRANGEMENT ON AMP PANEL (QTN300/350) (*2)
151	311080500230	PARTS ARRANGEMENT ON POWER PANEL (QTN300/350) (*2)
152	311080500240	PARTS ARRANGEMENT ON POWER PANEL (QTN300/350) (*2)
153	311080500250	PARTS ARRANGEMENT ON PCB PANEL (QTN300/350) (*2)
154	311080500261	PARTS ARRANGEMENT ON PCB PANEL (QTN300/350) (*3)
155	311080500271	PARTS ARRANGEMENT ON BASE PANEL (QTN300/350) (*3)
156	311080500281	PARTS ARRANGEMENT ON BREAKER BOX (QTN300/350) (*3)
157		
158	311080500312	TERMINAL BLOCK LAYOUT (QTN100) (*4)
159	311080500322	TERMINAL BLOCK LAYOUT (QTN200/300) (*4)
160	311080500330	CONNECTOR LAYOUT(ZL) ON CONTROL BOX (*1)
161	311080500410	NC OPERATING PANEL (1) (*1)
162	311080500420	NC OPERATING PANEL (2) (*1)
163		
164		
165		