

78

**YAMAHA**

**MODEL GUIDE  
PRESENTATION DE MODELE  
MODELLANLEITUNG**

**RD250 / RD400**



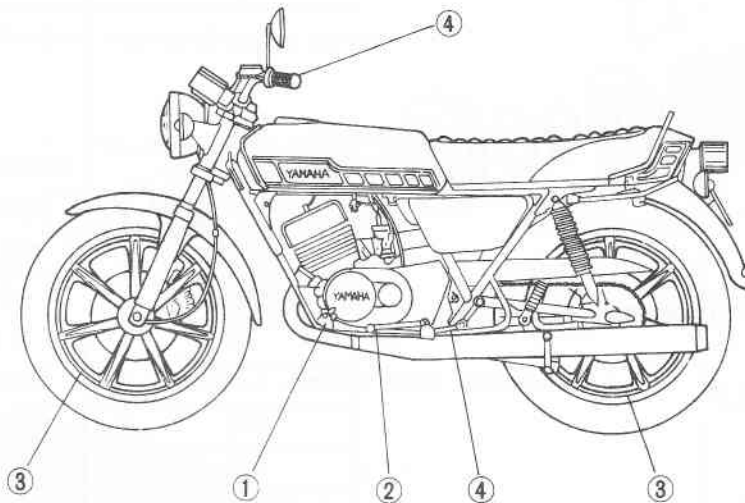
**YAMAHA**

**NOTE: INFORMATION AND OTHER TECHNICAL DATA (INCLUDING SPECIFICATIONS) IN THIS MODEL GUIDE MAY BE SUBJECT TO CHANGE WITHOUT PRIOR NOTICE.**

**I.D. & ENGINE/FRAME NUMBER**

MODEL NAME	I.D. Nos.	E/G STARTING Nos.	AREAS
RD250	2R8	1A2-220101	A, B, DK, NL, CH, UK
RD250	2T0	1A2-310101	D
RD250	2T1	2T1-000101	F
RD400	2R9	1A3-110101	A, B, DK, UK, SF, D, NL, S, CH
RD400	2T2	2T2-000101	F

**A. FEATURES**



- ① HIGH PERFORMANCE ENGINE WITH
  - NEW CYLINDER
  - NEW EXHAUST MUFFLER
  - C.D.I.
  - BIGGER CARBURETOR
- ② SOFT TOUCH OPERATION OF CHANGE PEDAL
- ③ CASTING WHEEL WITH BLACK COATING
- ④ BETTER RIDING POSITION WITH NEW HANDLEBARS AND FOOT RESTS

**B. DIFFERENCES FROM 1977 MODEL**

**MODIFICATION**

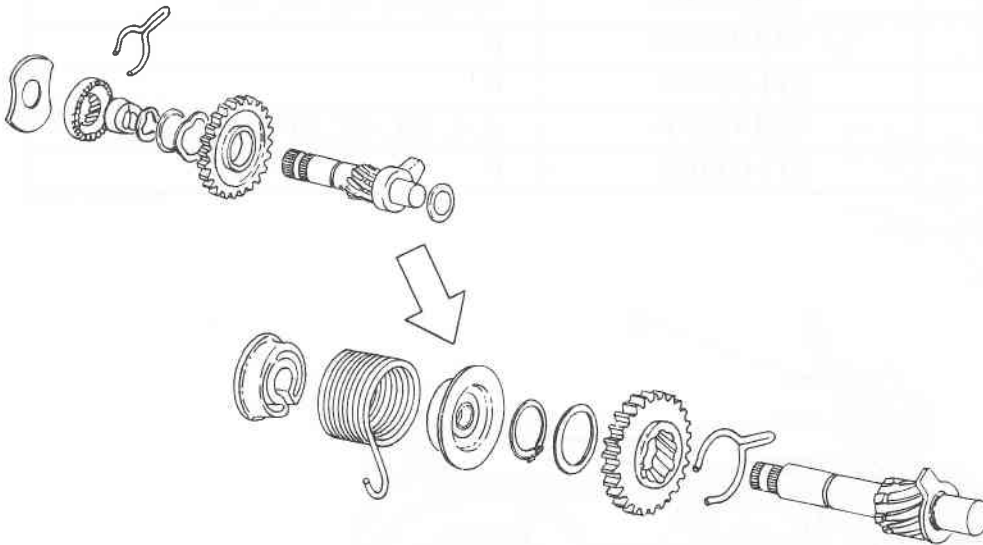
**REMARKS**

**[ENGINE SECTION]**

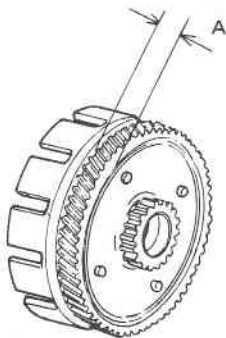
1. Kick starter has been changed from the ratchet type to the Bendix type.

Simpler construction

RD250  
RD400



2. Primary driven gear width has been reduced.

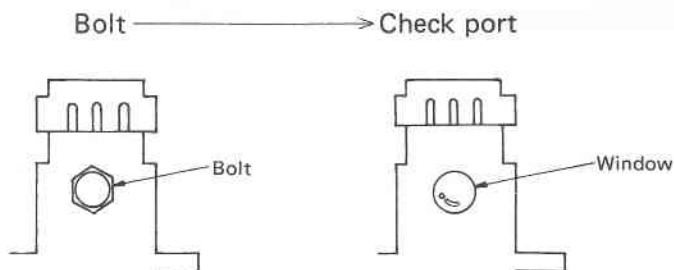


A dimension: 15 mm → 12 mm

Better function

3. Carburetor
  - a. Synchronization port

Easy operation



**MODIFICATION**

**REMARKS**

b. Carburetor setting

Easy engine setting

RD250

	'77 MODEL	'78 MODEL
MODEL	VM28SS	←
I.D. No.	1S200	2R800
MJ	# 115	←
AJ	1.0	0.8
JN	5L3-2	5L1-4
NJ	0-8	0-6
CA	2.5	2.0
AS	1¼	←
GS	# 70	←

**NOTE:** The above specification may be changed without prior notice.

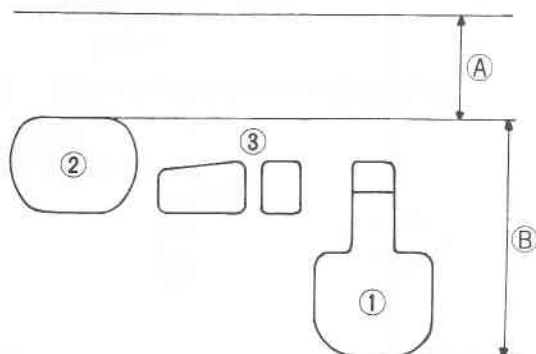
RD400

	'77 MODEL	'78 MODEL
MODEL	VM28SS	←
I.D. No.	1A300	2R900
MJ	# 120	# 145
AJ	0.5	←
JN	5L1-3	5J6-3
NJ	P-2	0-8
CA	2.5	←
PJ	25	←
AS	1½	←
GS	# 70	←

**NOTE:** The above specifications may be changed without prior notice.

4. For better engine performance the shape of transfer port and inlet port timing have been changed.

RD250



PORT TIMING (MM)

	'77 MODEL	'78 MODEL
A	29.5	←
B	62.5	66.5

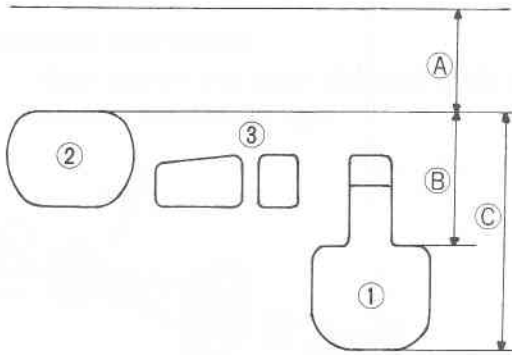
- ① Inlet port
- ② Exhaust port
- ③ Scavenging ports (Transfer)

RD250

**MODIFICATION**

**REMARKS**

RD400



PORT TIMING (MM)

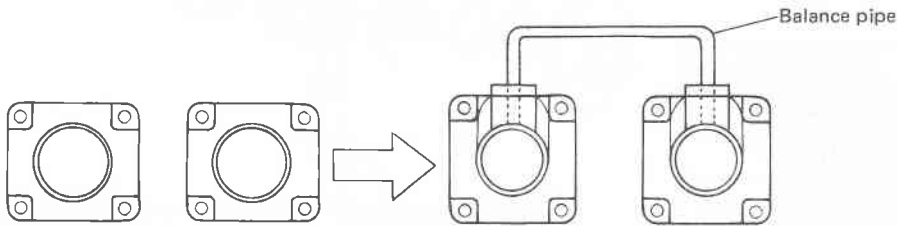
	'77 MODEL	'78 MODEL
A	33.5	←
B	39.5	41.5
C	64.0	68.5

- ① Inlet port
- ② Exhaust port
- ③ Scavenging ports (Transfer)

RD250  
RD400

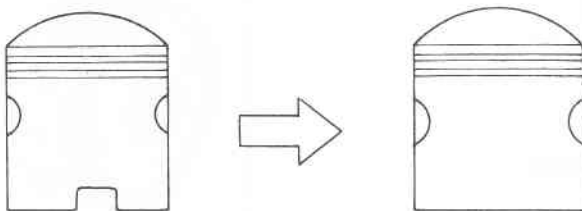
**5. MANIFOLD (For RD400 ONLY)**

For better engine performance, both right and left manifolds are provided with balance pipe.



**6. PISTON (For RD400 ONLY)**

Change in shape



**7. EXHAUST PIPE & MUFFLER**

Both inside diameter and volume have been changed.

Due to change of inlet port timing

Better engine performance

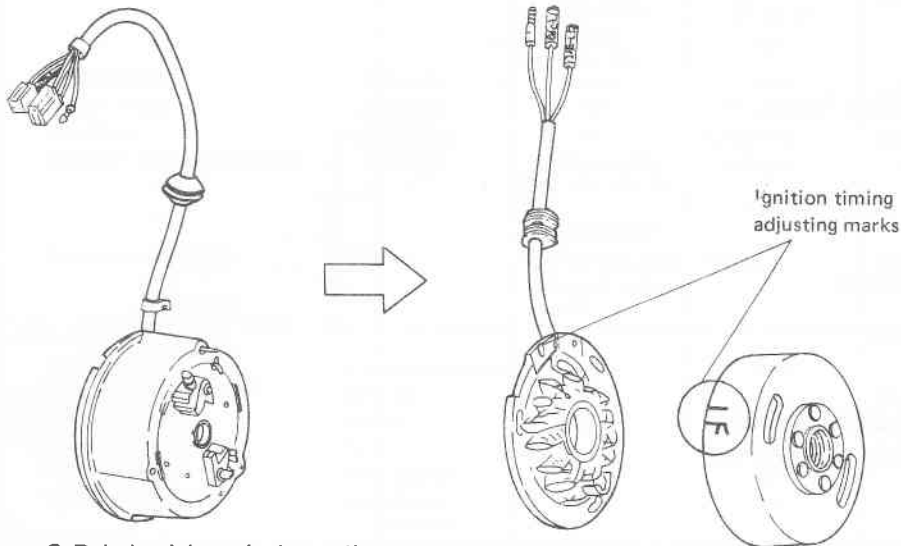
MODIFICATION

REMARKS

[ELECTRICAL SECTION]

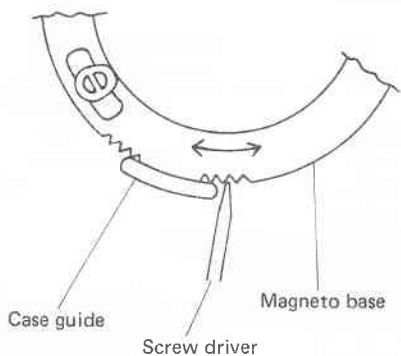
1. Modification of Ignition system  
Battery Ignition → C.D.I. Ignition

Better engine performance



Not interchangeable

C.D.I. Ignition timing adjustment procedures.



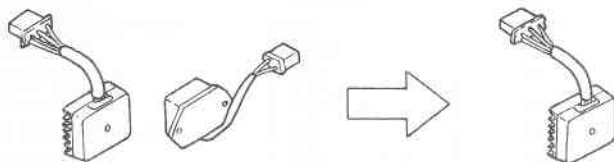
1. Install dialgauge to left side spark plug hole.
2. Rotate crankshaft counterclockwise up to T.D.C. and slowly turn it clockwise until dialgauge indicates the specified spark advance position.  
RD250 BTDC 2.00 ± 0.15 mm  
RD400 BTDC 2.30 ± 0.15 mm

3. At this time, adjust magneto base using screw driver until both marks (IF, I) become alignment.

2. Ignition coil 2 coils → 1 coil

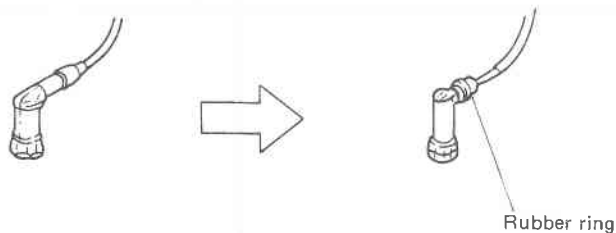
Due to use of CDI

3. Voltage regulator and rectifier  
Separate type → Integrated type



4. Spark plug cap with rubber ring.

Prevention of plug from coming off



RD250  
RD400

MODIFICATION

REMARKS

[FRAME SECTION]

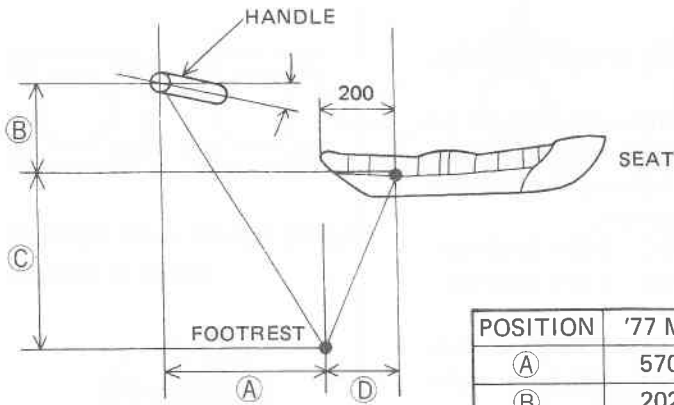
1. Caliper Ass'y (Front & Rear)  
Change of operation method

Fixed caliper type → Floating caliper type  
(Two pistons) (One piston)

2. Front fork Ass'y

Fork Travel 120 mm → 140 mm  
Inner tube diameter 34φ → 35φ

3. Better riding comfort due to change in riding position by changing the mounting position of handlebars and footrests.



POSITION	'77 MODEL	'78 MODEL
Ⓐ	570 mm	576 mm
Ⓑ	202	196
Ⓒ	500	500
Ⓓ	199	224
Q	0°	9°30'

RD250  
RD400

### C. GENERAL SPECIFICATION

	RD250			RD400		
	D	CH, DK, F UK, NL, A	B	D, CH, S	SF, DK, F UK, NL, A, I	B
<b>DIMENSIONS/WEIGHT</b>						
Overall length	2,030 mm	2,015 mm (CH, DK) 1,995 mm (UK, NL)	1,955 mm (F, A, B) ←	2,030 mm ←	2,015 mm (DK) 1,995 mm (F, NL, UK, I, A) ←	1,995 mm ←
Overall width	760 mm	←	←	760 mm	←	←
Overall height	1,060 mm	←	←	1,060 mm	←	←
Wheelbase	1,320 mm	←	1,325 mm	1,320 mm	←	1,325 mm
Minimum ground clearance	150 mm	145 mm (CH, DK, UK, NL, D, F) 150 mm (A)	150 mm	150 mm	←	←
Machine net weight	172 kg	170 kg (CH, DK) 172 kg (F, UK, NL, A)	170 kg	174 kg	172 kg (DK) 174 kg	174 kg
<b>ENGINE</b>						
Type	2 cycle aircooled	←	←	←	←	←
Bore/Stroke	54 x 54	←	←	64 x 62	←	←
Displacement	247 cc	←	←	398 cc	←	←
Compression ratio	N, A	6,2	←	6,2	←	←
Starting system	Kick starter	←	←	←	←	←
Lubricating system	Automatic separate	←	←	←	←	←
<b>CLUTCH</b>						
Type	Wet multiple disk	←	←	←	←	←
Primary drive system	Gear	←	←	Gear	←	←
Primary drive ratio	68/21	←	←	66/23	←	←
<b>TRANSMISSION</b>						
Type	Constant mesh	←	←	←	←	←
Reduction ratio 1st	36/14	←	←	←	←	←
2nd	32/18	←	←	←	←	←
3rd	29/22	←	←	←	←	←
4th	26/24	←	←	←	←	←
5th	25/26	←	←	←	←	←
6th	24/27	←	←	←	←	←
<b>SECONDARY DRIVE</b>						
Type	Chain	←	←	←	←	←
Reduction ratio	38/17	←	36/17	35/17	←	36/17
<b>ELECTRICAL</b>						
Ignition type	C.D.I.	←	←	←	←	←

### D. SERVICE DATA

<b>CARBURETION</b>						
Type	VM28SS	←	←	VM28SS	←	←
Effective venturi size	28	←	←	28	←	←
Main jet	#115	←	←	#145	←	←
Needle jet	O-64	←	←	O-8	←	←
Jet needle	5L1-4	←	←	5J6-3	←	←
Air screw (Turns out)	1½	←	←	1½	←	←
Cut away	2.0	←	←	2.5	←	←
<b>VOLUMES/TYPE FLUID</b>						
Gasoline tank	16.5ℓ	←	←	16.5ℓ	←	←
Transmission	1.5ℓ	←	←	1.5ℓ	←	←

RD250



M E M O

RD250  
RD400



**YAMAHA MOTOR CO., LTD.**

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