

TABLE No. 19

Troubles that may happen during the functioning of the engine and relative causes.

1. Non starting
2. Difficult starting
3. Stops after starting
4. Irregular performance
5. No power
6. Losses of strokes
7. Back firing to carburetor
8. Black smoke at the exhaust
9. Head knocking
10. Head over-heating (auto-ignition)
11. Abnormal noises
12. Exhaust pipe red-hot
13. Starting return shocks
14. Blue smoke at the exhaust

IGNITION TROUBLES

	1	2	3	4	5	6	7	8	9	10	11	12	13	14
- Dirty sparking plug, deteriorated or with electrodes irregularly spaced	o	o		o	o	o				o				
- Low thermic degree sparking plug					o	o				o				
- High thermic degree sparking plug (cold)		o		o										
- Ignition wire interrupted	o													
- Ignition wire deteriorated	o	o	o	o		o								
- Condenser interrupted	o													
- Condenser in short circuit	o													
- High tension coil in short circuit (discharges inside)	o													
- Reduced or excessive distance between the contact-breaker contacts		o	o	o	o	o								
- Contact-breaker contacts dirty oxidized or worn out		o	o	o	o	o								

- Contact breaker contacts do not open
- Excessive ignition advance
- Insufficient ignition advance
- Discharged battery or defective

CARBURATION TROUBLES

- Fuel tank breather closed
- Gasoline pipe clogged
- Poor quality fuel or containing impurities or foreign materials
- Maximum jet partially or totally clogged (lean mixture)
- Minimum jet clogged
- Maximum jet small (lean mixture)
- Maximum jet large (rich mixture)
- Float clogged or pierced
- Throttle control too opened
- choke control too opened
- Carburetor flooded on starting (fuel dripping from float chamber)
- Pin trapped between the fixing plates of carburetor-head
- Carburetor filter dirty

	1	2	3	4	5	6	7	8	9	10	11	12	13	14
Contact breaker contacts do not open	0													
Excessive ignition advance	0	0	0	0	0	0	0		0		0		0	
Insufficient ignition advance	0	0	0	0	0	0		0	0	0		0		
Discharged battery or defective	0	0						0	0	0		0		
Fuel tank breather closed	0	0												
Gasoline pipe clogged	0													
Poor quality fuel or containing impurities or foreign materials		0	0	0			0	0	0	0		0		
Maximum jet partially or totally clogged (lean mixture)		0	0	0	0					0		0		
Minimum jet clogged			0											
Maximum jet small (lean mixture)		0		0						0		0		
Maximum jet large (rich mixture)		0		0				0		0				
Float clogged or pierced	0	0												
Throttle control too opened		0												
Choke control too opened		0												
Carburetor flooded on starting (fuel dripping from float chamber)	0	0												
Pin trapped between the fixing plates of carburetor-head	0	0	0	0	0									
Carburetor filter dirty	0		0	0										

LUBRICATION TROUBLES

- Low oil level
- Oil filter dirty
- Old oil or of poor quality
- Excessive oil level
- Oil too fluid (Summertime)
- Oil too thick (Wintertime)
- Defective compression rings or with aligned cuts

MECHANICAL TROUBLES

- * Sparking plug or head not fixed (loose)
- Piston rings worn out, damaged
- Marked cylinder, ovalized
- Leakages from the valves
- Valve jammed
- Valve springs broken
- Excessive plays
- Excessive after carbons in the explosion chamber
- Excessive compression ratio
- Exhaust pipe clogged

COOLING TROUBLES

- Cylinder and head fins dirty or oiled

	1	2	3	4	5	6	7	8	9	10	11	12	13	14
- Low oil level					0					0	0			
- Oil filter dirty					0					0	0			
- Old oil or of poor quality					0						0			
- Excessive oil level		0												0
- Oil too fluid (Summertime)											0			0
- Oil too thick (Wintertime)		0												
- Defective compression rings or with aligned cuts					0	0								0
* Sparking plug or head not fixed (loose)		0		0	0	0	0			0				
- Piston rings worn out, damaged		0		0	0	0	0			0				
- Marked cylinder, ovalized		0		0	0	0	0			0				
- Leakages from the valves		0		0	0	0	0			0				
- Valve jammed		0												
- Valve springs broken		0		0	0	0				0	0			
- Excessive plays				0							0			
- Excessive after carbons in the explosion chamber				0	0					0	0			
- Excessive compression ratio										0	0			
- Exhaust pipe clogged		0			0									
- Cylinder and head fins dirty or oiled										0				