

- A Mixing chamber
- B Throttle valve
- C Jet needle and clip
- D Air valve ('choke')
- E Mixing chamber union
- F Jet block
- G Cable adjusters
- H Jet block barrel
- J Pilot jet
- K Pilot passage
- L Pilot air passage
- M Pilot outlet
- N Pilot bypass
- O Needle jet
- P Main jet
- Q Float chamber union bolt
- R Float chamber
- S Float needle seat
- T Float
- U Float needle valve
- V Clip
- W Float chamber cover
- X Lock screw
- Y Mixing chamber top
- Z Mixing chamber lock ring
- Z1 Lock spring

Fig. 3.18 The Amal 289 'Standard' carburettor

This Amal instrument proved popular for many years, and was standard equipment on the majority of machines of that era. Note the similarities between it and the TT9 racing carburettor.

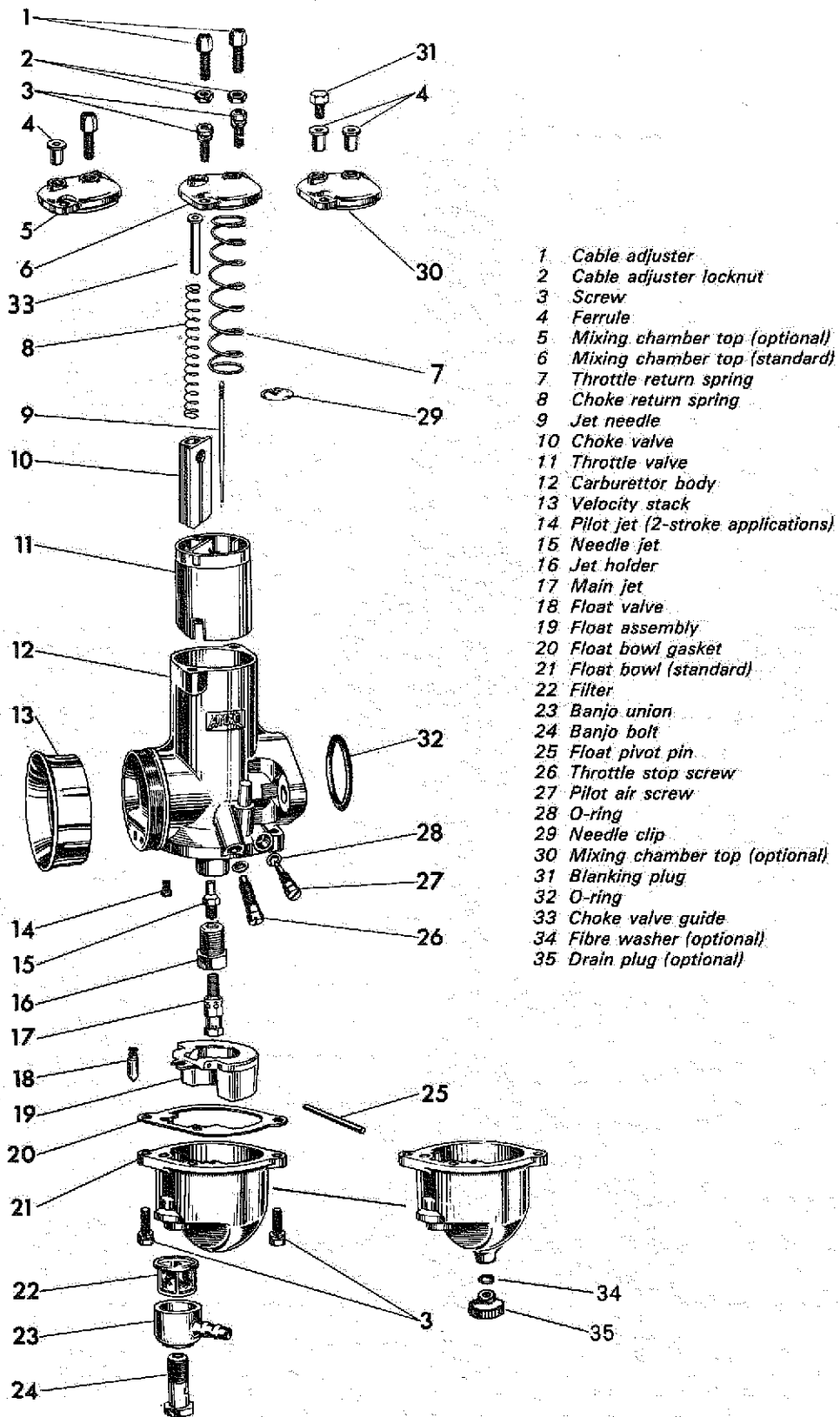
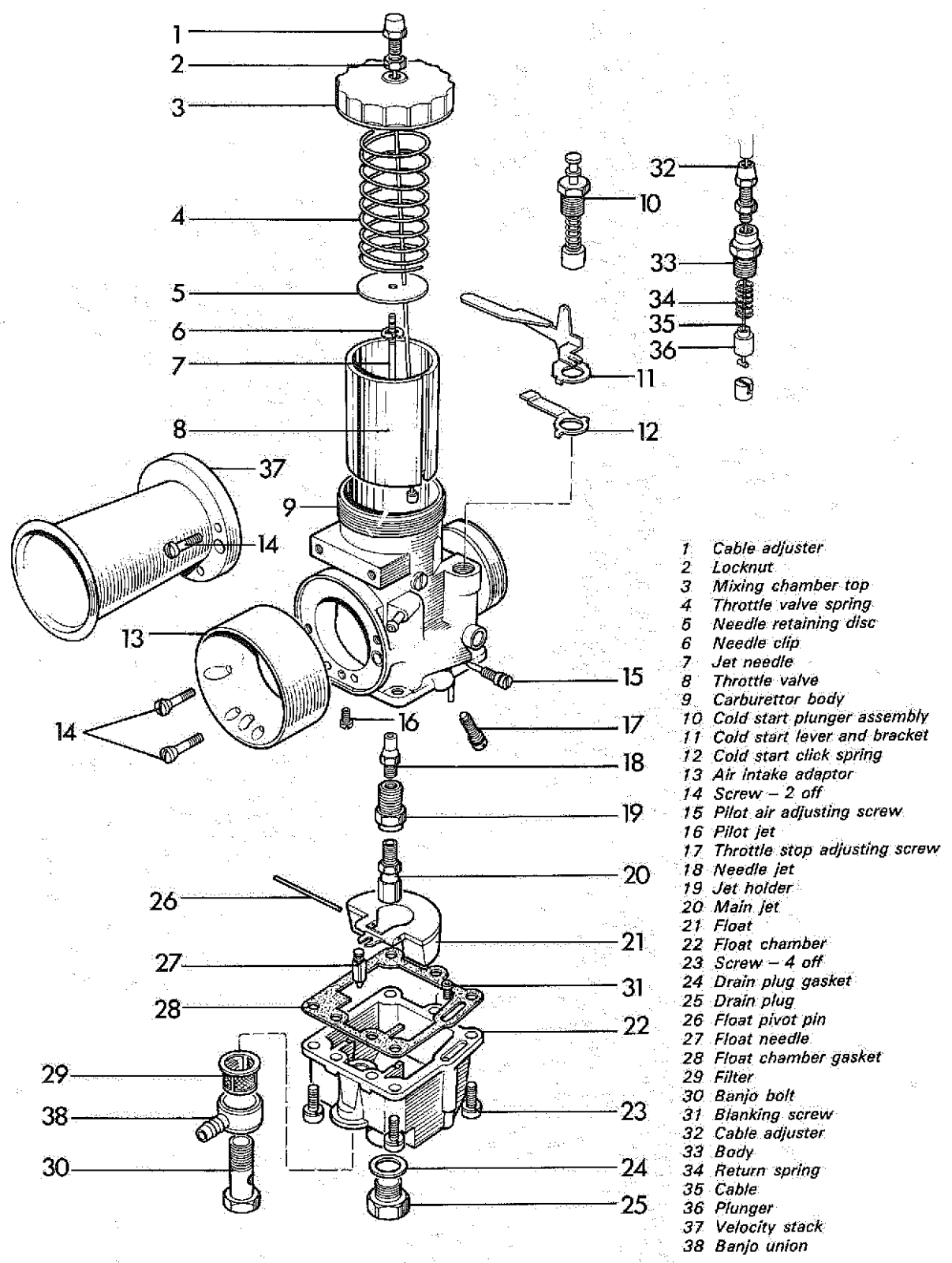


Fig. 3.24 The Amal Concentric Mk 1



- 1 Cable adjuster
- 2 Locknut
- 3 Mixing chamber top
- 4 Throttle valve spring
- 5 Needle retaining disc
- 6 Needle clip
- 7 Jet needle
- 8 Throttle valve
- 9 Carburettor body
- 10 Cold start plunger assembly
- 11 Cold start lever and bracket
- 12 Cold start click spring
- 13 Air intake adaptor
- 14 Screw - 2 off
- 15 Pilot air adjusting screw
- 16 Pilot jet
- 17 Throttle stop adjusting screw
- 18 Needle jet
- 19 Jet holder
- 20 Main jet
- 21 Float
- 22 Float chamber
- 23 Screw - 4 off
- 24 Drain plug gasket
- 25 Drain plug
- 26 Float pivot pin
- 27 Float needle
- 28 Float chamber gasket
- 29 Filter
- 30 Banjo bolt
- 31 Blanking screw
- 32 Cable adjuster
- 33 Body
- 34 Return spring
- 35 Cable
- 36 Plunger
- 37 Velocity stack
- 38 Banjo union

The Amal Concentric Mk II

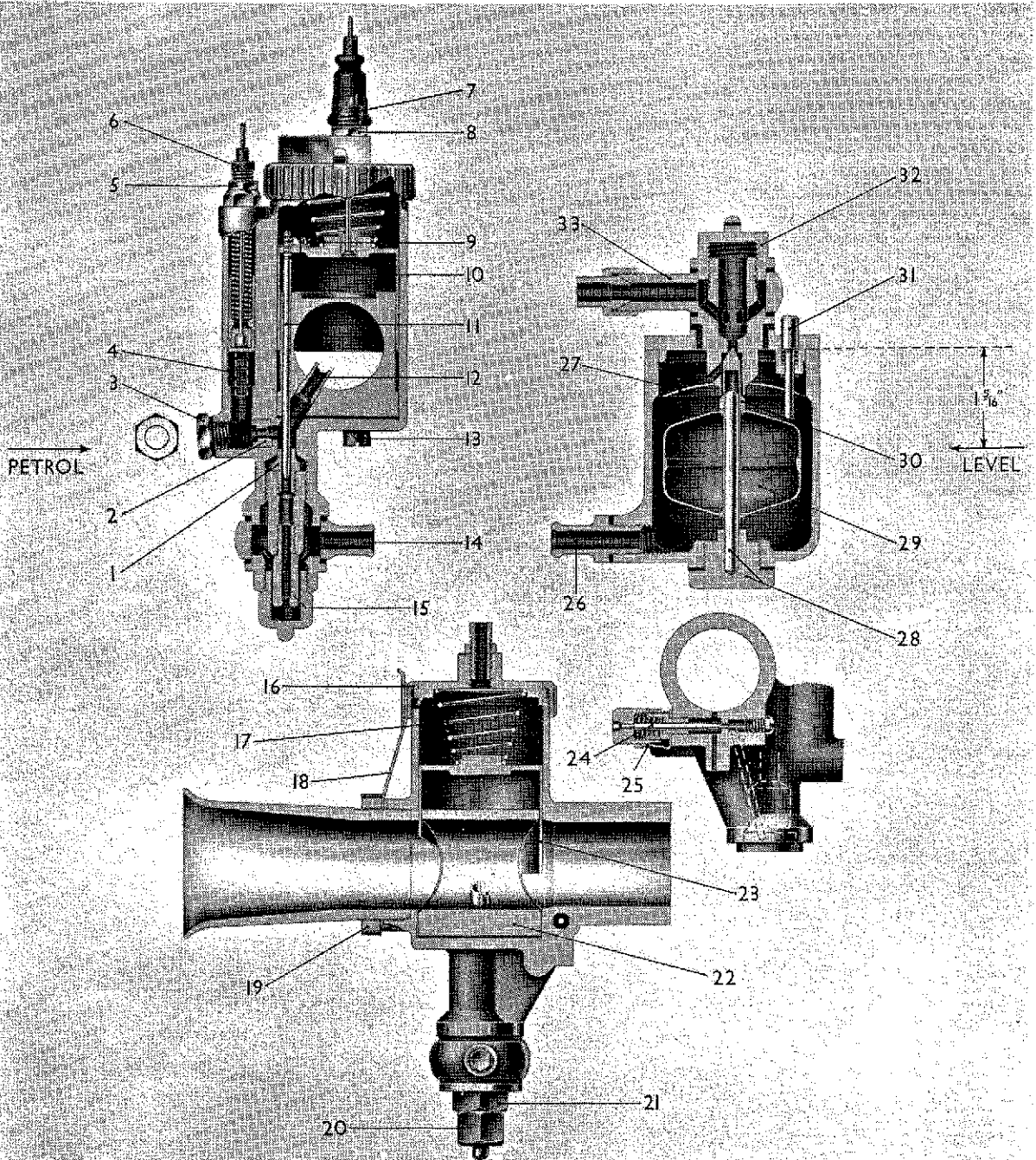


Fig. 3.20 Amal GP carburettor – sectioned view

- | | | |
|----------------------------|-----------------------|-------------------------------|
| 1 Needle jet | 12 Spring tube | 23 Throttle valve |
| 2 Air jet | 13 Screws | 24 Pilot jet adjusting needle |
| 3 Air jet plug | 14 Banjo union | 25 Pilot adjuster lock spring |
| 4 Primary air slot | 15 Main jet | 26 Petrol outlet connector |
| 5 Locknut | 16 Mixing chamber cap | 27 Baffle plate |
| 6 Air valve cable adjuster | 17 Return spring | 28 Base plug and guide rod |
| 7 Throttle cable adjuster | 18 Lock spring | 29 Float |
| 8 Locknut | 19 Air tube lock ring | 30 Float needle |
| 9 Needle clip | 20 Jet plug | 31 Tickler |
| 10 Needle clip screw | 21 Jet holder | 32 Banjo nut |
| 11 Jet needle | 22 Choke adaptor | 33 Banjo union |

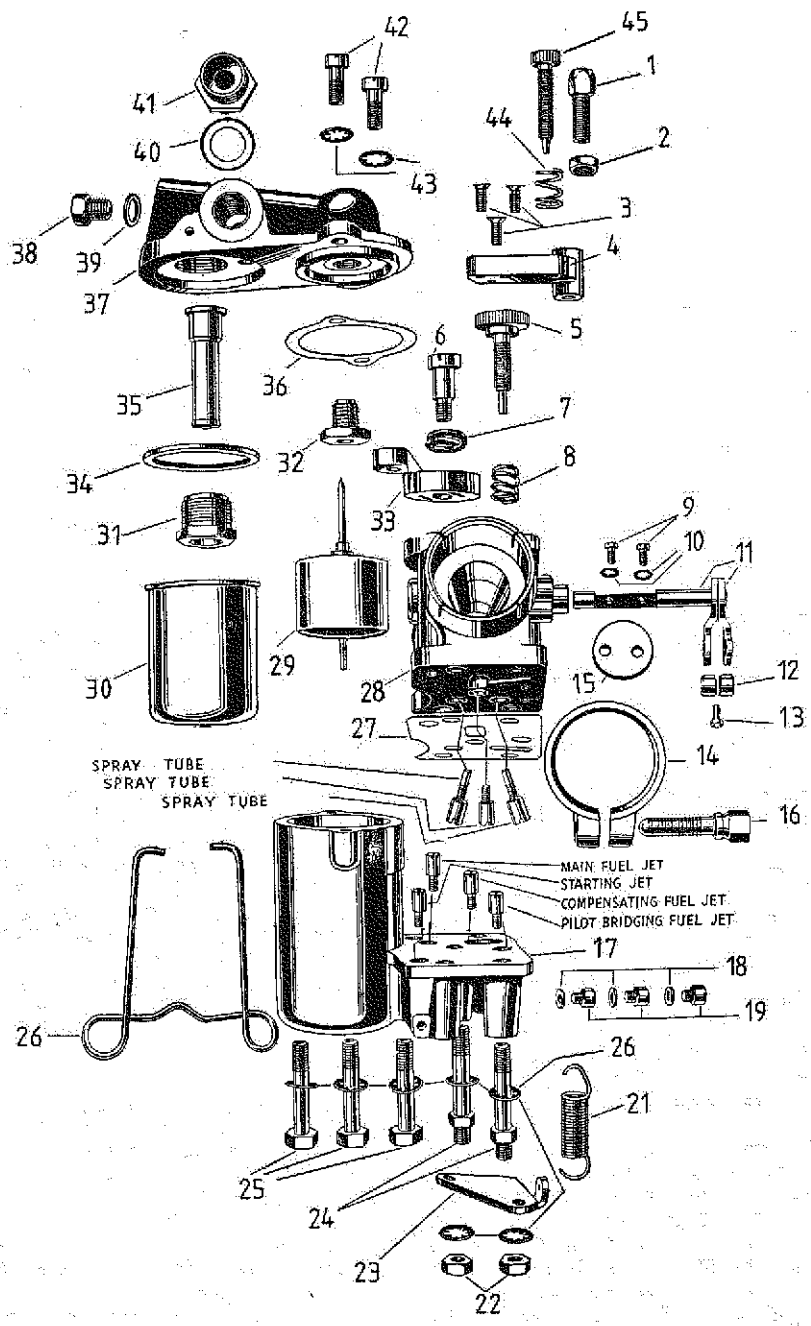


Fig. 7.1. The Amal LAS 84 fixed-jet carburettor.

- | | | |
|----------------------------------|-------------------------------------|-----------------------------------|
| 1 Cable adjuster | 16 Clamp screw | 31 Filter element sleeve |
| 2 Locknut | 17 Mixing chamber body - lower half | 32 Float valve seat |
| 3 Screws | 18 Blanking plug washers | 33 Starting lever |
| 4 Cable adjuster fixing plate | 19 Blanking plugs | 34 Seal |
| 5 Pilot air screw | 20 Shakeproof washers | 35 Filter element |
| 6 Starting lever pivot screw | 21 Throttle return spring | 36 Gasket |
| 7 Double spring washer | 22 Nuts | 37 Float chamber cover |
| 8 Adjuster screw friction spring | 23 Throttle spring anchor plate | 38 Plug screw |
| 9 Throttle butterfly screws | 24 Mixing chamber bolts | 39 Sealing washer |
| 10 Washers | 25 Mixing chamber bolts | 40 Sealing washer |
| 11 Throttle spindle | 26 Filter cup retaining clip | 41 Fuel inlet connection |
| 12 Trunnion | 27 Gasket | 42 Screws |
| 13 Cable nipple | 28 Mixing chamber body - upper half | 43 Shakeproof washers |
| 14 Mounting clamp | 29 Float and needle assembly | 44 Adjuster screw friction spring |
| 15 Throttle butterfly plate | 30 Filter cup | 45 Throttle stop screw |

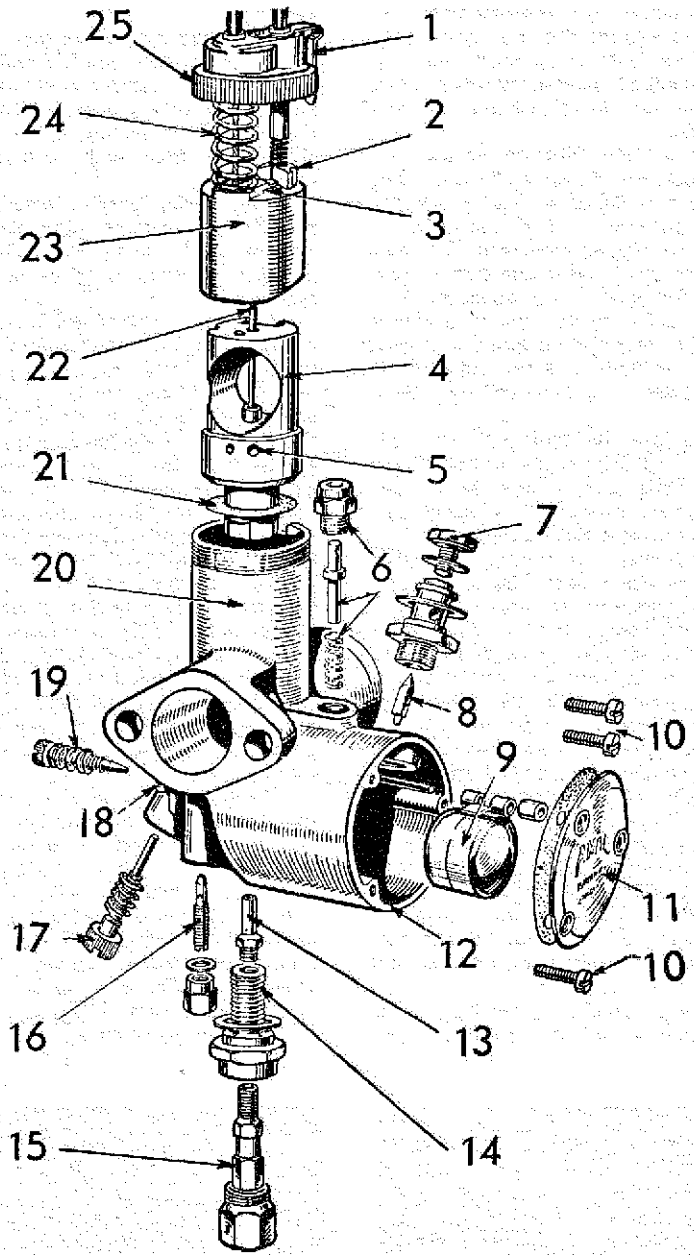


Fig. 3.21 The Amal Monobloc carburettor

- | | | | | | | | |
|---|--------------------------------|----|---------------------|----|---------------------|----|------------------|
| 1 | Mixing chamber top lock spring | 7 | Banjo bolt | 14 | Jet holder | 20 | Carburettor body |
| 2 | Air valve | 8 | Float needle | 15 | Main jet | 21 | Fibre washer |
| 3 | Needle clip | 9 | Float | 16 | Pilot jet | 22 | Jet needle |
| 4 | Jet block | 10 | Screws | 17 | Throttle stop screw | 23 | Throttle valve |
| 5 | Pilot bypass | 11 | Float chamber cover | 18 | Locating screw | 24 | Return spring |
| 6 | Tickler assembly | 12 | Float chamber | 19 | Pilot air screw | 25 | Lock ring |
| | | 13 | Needle jet | | | | |

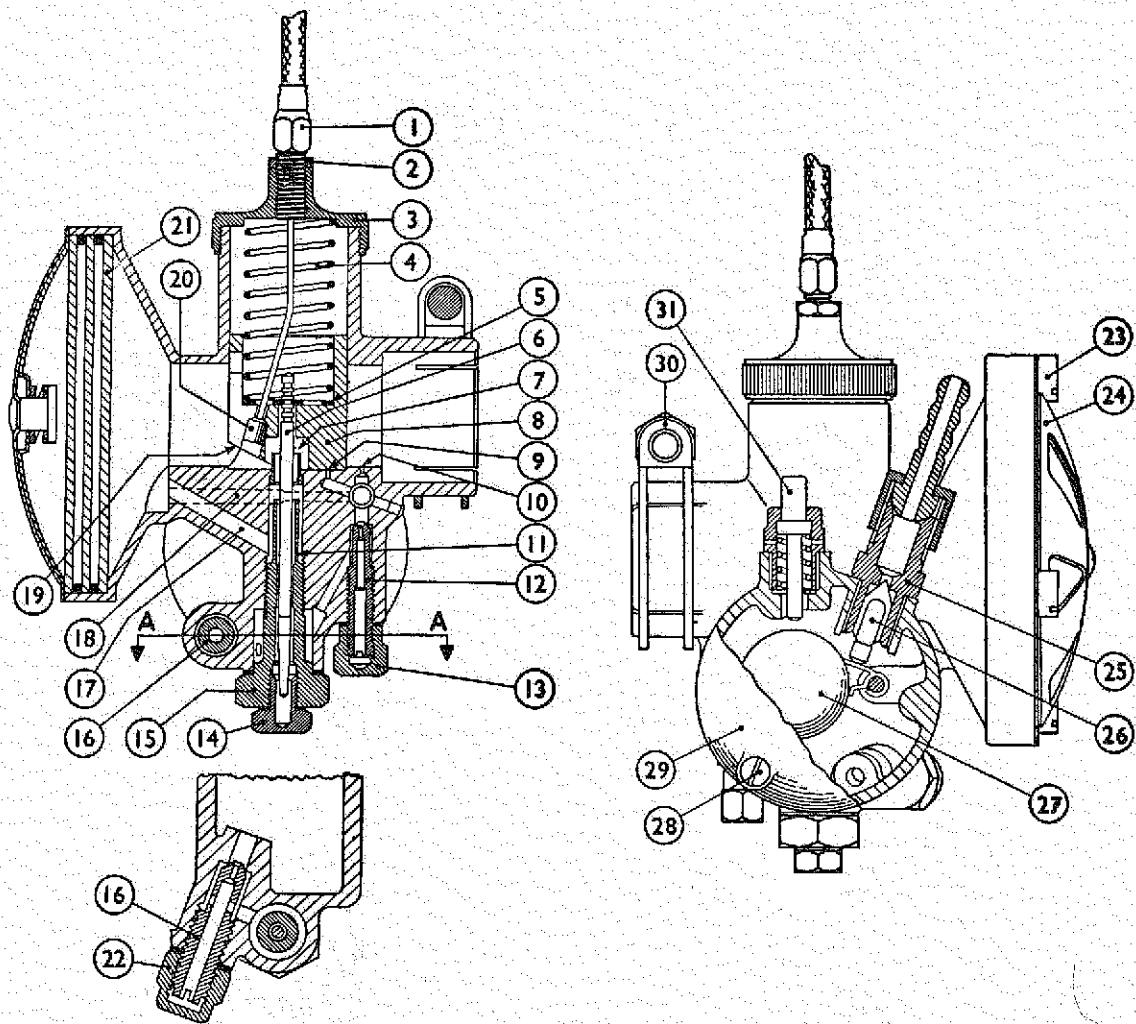
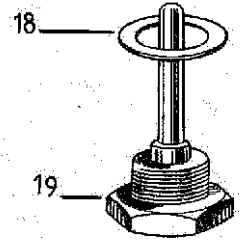
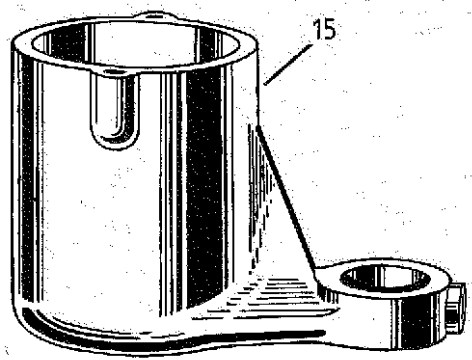
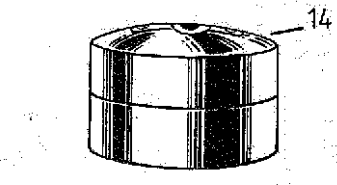
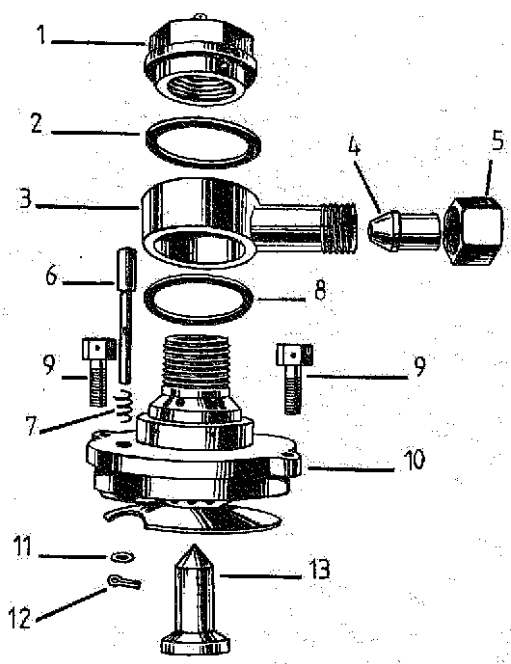


Fig. 3.22 The Amal Monobloc type 363

- | | | |
|--------------------------|----------------------------|-------------------------------|
| 1 Cable adjuster | 13 Cap nut | 24 Strangler |
| 2 Locknut | 14 Plug screw | 25 Float valve body |
| 3 Mixing chamber top | 15 Needle jet | 26 Float valve |
| 4 Throttle return spring | 16 Main jet | 27 Float assembly |
| 5 Needle clip | 17 Primary air passage | 28 Float chamber cover screw |
| 6 Jet needle | 18 Pilot air passage | 29 Float chamber cover |
| 7 Primary air choke | 19 Throttle valve cut-away | 30 Fixing clamp |
| 8 Throttle valve | 20 Throttle cable nipple | 31 Tickler |
| 9 Pilot bypass | 21 Air cleaner | 32 Pilot air screw |
| 10 Pilot outlet | 22 Cap nut | 33 Throttle stop screw |
| 11 Bleed holes | 23 Screw | 34 Throttle valve guide screw |
| 12 Pilot jet | | |



- 1 Banjo nut
- 2 Sealing washer
- 3 Banjo union
- 4 Ferrule
- 5 Gland nut
- 6 Tickler
- 7 Spring
- 8 Sealing washer
- 9 Screw
- 10 Float chamber top
- 11 Washer
- 12 Split pin
- 13 Float needle
- 14 Float
- 15 Float chamber
- 16 Plug screw
- 17 Sealing washer
- 18 Sealing washer
- 19 Plug and guide pin

Fig. 3.17 Amal TT Float chamber assembly

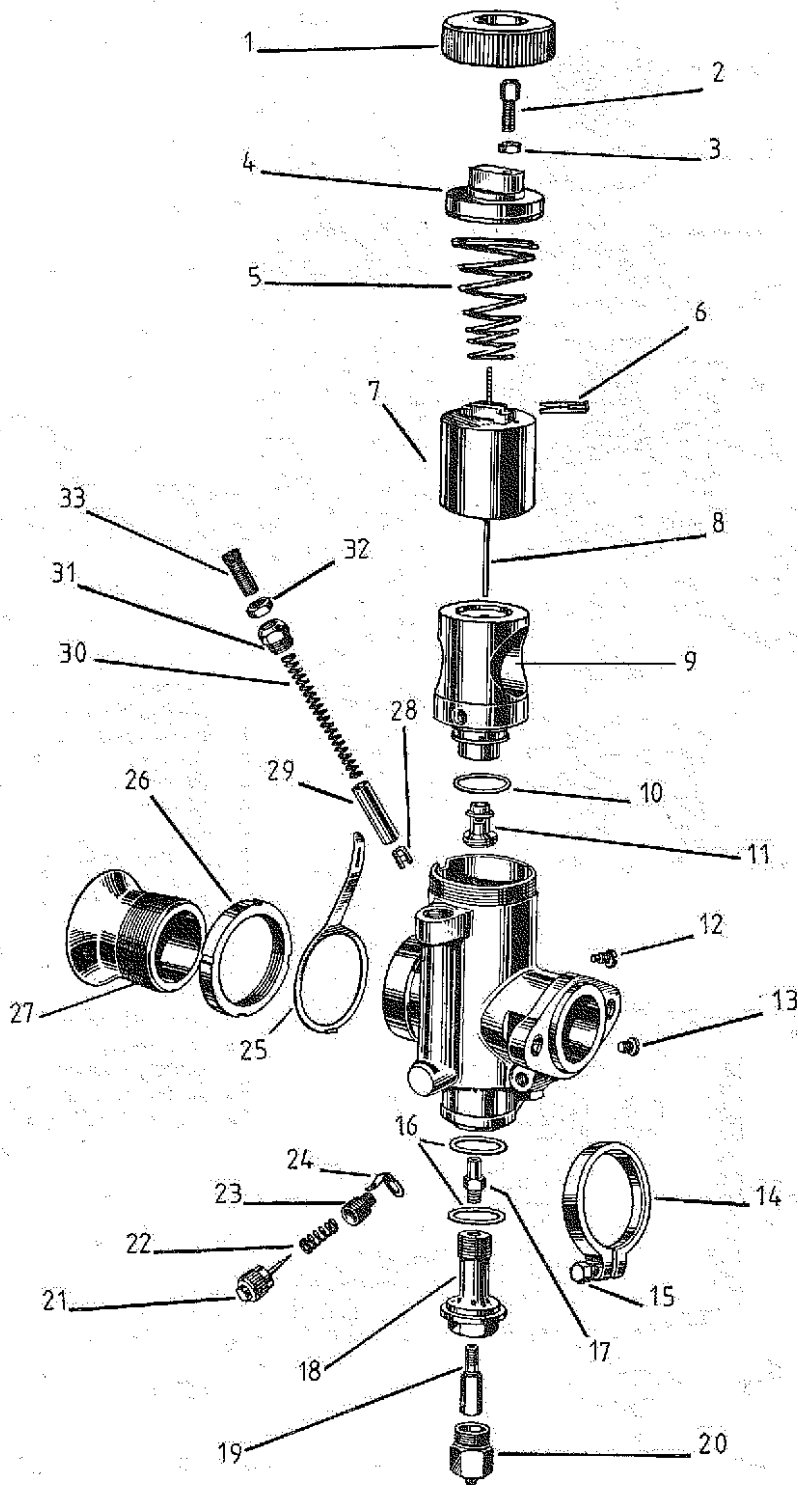


Fig. 3.16 The Amal TT9 Mixing chamber

- | | | | | | | | |
|---|-------------------------|----|------------------------|----|---------------------|----|-----------------|
| 1 | Mixing chamber cap | 10 | Seal | 18 | Jet holder | 26 | Lock ring |
| 2 | Throttle cable adjuster | 11 | Jet choke tube | 19 | Main jet | 27 | Air intake tube |
| 3 | Locknut | 12 | Adaptor locating screw | 20 | Plug screw | 28 | Nipple holder |
| 4 | Mixing chamber top | 13 | Plug screw | 21 | Pilot needle | 29 | Air valve |
| 5 | Return spring | 14 | Outlet clip | 22 | Friction spring | 30 | Spring |
| 6 | Needle clip | 15 | Screw | 23 | Pilot needle insert | 31 | Air barrel top |
| 7 | Throttle valve | 16 | Seals | 24 | Spring catch | 32 | Locknut |
| 8 | Jet needle | 17 | Needle jet | 25 | Lock spring | 33 | Adjuster |
| 9 | Choke adaptor | | | | | | |

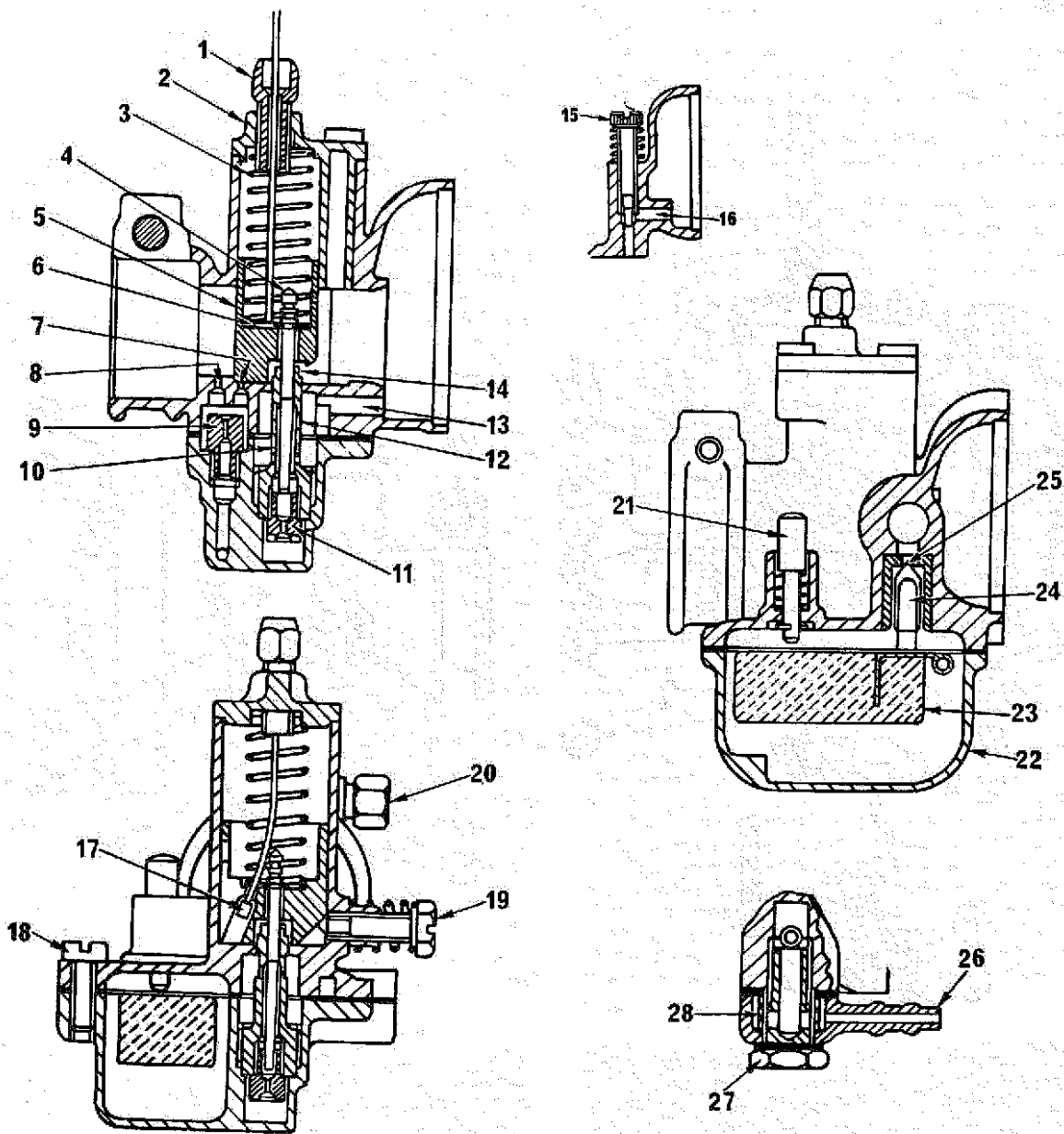


Fig. 3.23 The Amal Type 19

In this Monobloc derivative, the float assembly has been moved as near as possible to the central axis of the carburettor, pointing the way to the new Concentric types.

- | | | |
|---------------------------|--------------------------|---------------------|
| 1 Throttle cable adjuster | 11 Main jet | 20 Mounting clamp |
| 2 Mixing chamber top | 12 Bleed holes | 21 Tickler |
| 3 Throttle return spring | 13 Primary air passage | 22 Float bowl |
| 4 Jet needle | 14 Choke tube | 23 Float assembly |
| 5 Throttle valve | 15 Pilot air screw | 24 Float valve |
| 6 Needle clip | 16 Pilot air passage | 25 Float valve seat |
| 7 Bypass outlet | 17 Throttle cable nipple | 26 Banjo union |
| 8 Pilot outlet | 18 Screw | 27 Banjo bolt |
| 9 Pilot jet | 19 Throttle stop screw | 28 Filter |
| 10 Needle jet | | |