

MODELS: Pratt & Whitney Hornet B, B1, B1-G, SB-1, S1B1, S1B1-G, S2B1, S2B1-G, S3B1

T.C. NUMBER: ATC 28

Model - Hornet	B, B1	B1-G
Type - 9RA	Direct drive	3:2 - reduction gearing
Rating:		
Maximum continuous, hp, rpm, at S.L. pressure altitude	575-1950-S.L.	--
Take-off (one minute), hp, rpm, at full throttle	575-1950	--
Fuel (minimum octane aviation gasoline)	73	--
Bore and stroke, in.	6.250 x 6.750	--
Displacement, cu. in.	1860	--
Compression ratio	5:1	--
Weight (dry), lbs.	840	930
Supercharging		
(Impeller gear ratio)	8:1	--
Carburetion	Stromberg NA-Y8C carburetor	--
Ignition, dual	Scintilla VAG-9C magnetos	--
NOTES	1, 2, 4, 6, 7	3, 5, 7
Certification basis	Approved Type Certificate No. 28	

NOTE 1. Hornet SB-1 eligible with rating of 575 hp at 1950 rpm at 5000 ft. pressure altitude with impeller gear ratio 10:1 and 83 minimum octane fuel. Two throttle stops shall be installed and used below 5000 ft. altitude in accordance with the manufacturer's approved instructions: the first, to limit the engine to 1850 rpm in level flight at S.L. and to be used between S.L. and 2500 ft.; the second, to limit the engine to 1900 rpm in level flight at S.L. and to be used between 2500 ft. and 5000 ft. altitude.

NOTE 2. Hornet S1B1 eligible with rating of 575 hp at 1950 rpm at 6000 ft. pressure altitude with compression ratio 6:1, impeller gear ratio 10:1 and 86 minimum octane fuel. Two throttle stops shall be installed and used below 6000 ft. altitude in accordance with the manufacturer's approved instructions; the first, to limit the engine to 1850 rpm in level flight at S.L. and to be used between S.L. and 2000 ft.; the second, to limit the engine to 1900 rpm in level flight at S.L. and to be used between 2,000 ft. and 6000 ft. altitude.

NOTE 3. Hornet S1B1-G eligible with rating of 575 hp at 2000 rpm at 6000 ft. pressure altitude with compression ratio 6:1, impeller gear ratio 10:1 and 86 minimum octane fuel. Two throttle stops shall be installed and used below 6000 ft. altitude in accordance with the manufacturer's approved instructions; the first, to limit the engine to 1850 rpm in level flight at S.L. and to be used between S.L. and 3000 ft.; the second, to limit the engine to 1925 rpm in level flight at S.L. and to be used between 3000 ft. and 6000 ft. altitude.

NOTE 4. Hornet S2B1 eligible with rating of 575 hp at 1950 rpm at 8000 ft. pressure altitude with compression ratio 6:1, impeller gear ratio 12:1 and 86 minimum octane fuel. Two throttle stops shall be installed and used below 8000 ft. altitude in accordance with the manufacturer's approved instructions; the first, to limit the engine to 1800 rpm in level flight at S.L. and to be used between S.L. and 3000 ft.; the second, to limit the engine to 1850 rpm in level flight at S.L. and to be used between 3000 ft. and 8000 ft. altitude.

NOTE 5. Hornet S2B1-G eligible with rating of 575 hp at 2000 rpm at 8000 ft. pressure altitude with compression ratio 6:1, impeller gear ratio 12:1, weight 933 lbs. and 86 minimum octane fuel. Two throttle stops shall be installed and used below 8000 ft. altitude in accordance with the manufacturer's approved instructions; the first, to limit the engine to 1850 rpm in level flight at S.L. and to be used between S.L. and 3000 ft.; the second, to limit the engine to 1900 rpm in level flight at S.L. and to be used between 3000 ft. and 8000 ft. altitude.

NOTE 6. Hornet S3B1 eligible with rating of 575 hp at 1950 rpm at 5000 ft. pressure altitude with compression ratio 6:1, impeller gear ratio 8:1 and 80 minimum octane fuel. Two throttle stops shall be installed and used below 5000 ft. altitude in accordance with the manufacturer's approved instructions; the first, to limit the engine to 1850 rpm in level flight at S.L. and to be used between S.L. and 2500 ft.; the second, to limit the engine to 1900 rpm in level flight at sea level and to be used between 2500 ft. and 5000 ft. altitude.

NOTE 7. Approval expired 1/8/36. No engines of these models manufactured after this date or with serial numbers above 2205 eligible for use in certificated aircraft.