

Company: Bonneville Power Administration

Name:

Date: 11/26/2006

Pump:

Size: 4"5821
 Type: 5800-HSC
 Synch speed: 1200 rpm
 Curve: 210406A
 Specific Speeds:
 Dimensions:
 Speed: 1165 rpm
 Dia: 9.75 in
 Impeller: D4C1A
 Ns: 1578
 Nss: 5579
 Suction: 5 in
 Discharge: 4 in

Pump Limits:

Temperature: 160 °F
 Pressure: 175 psi g
 Sphere size: 0.63 in
 Power: --- hp
 Eye area: --- in²

Search Criteria:

Flow: --- US gpm
 Head: --- ft

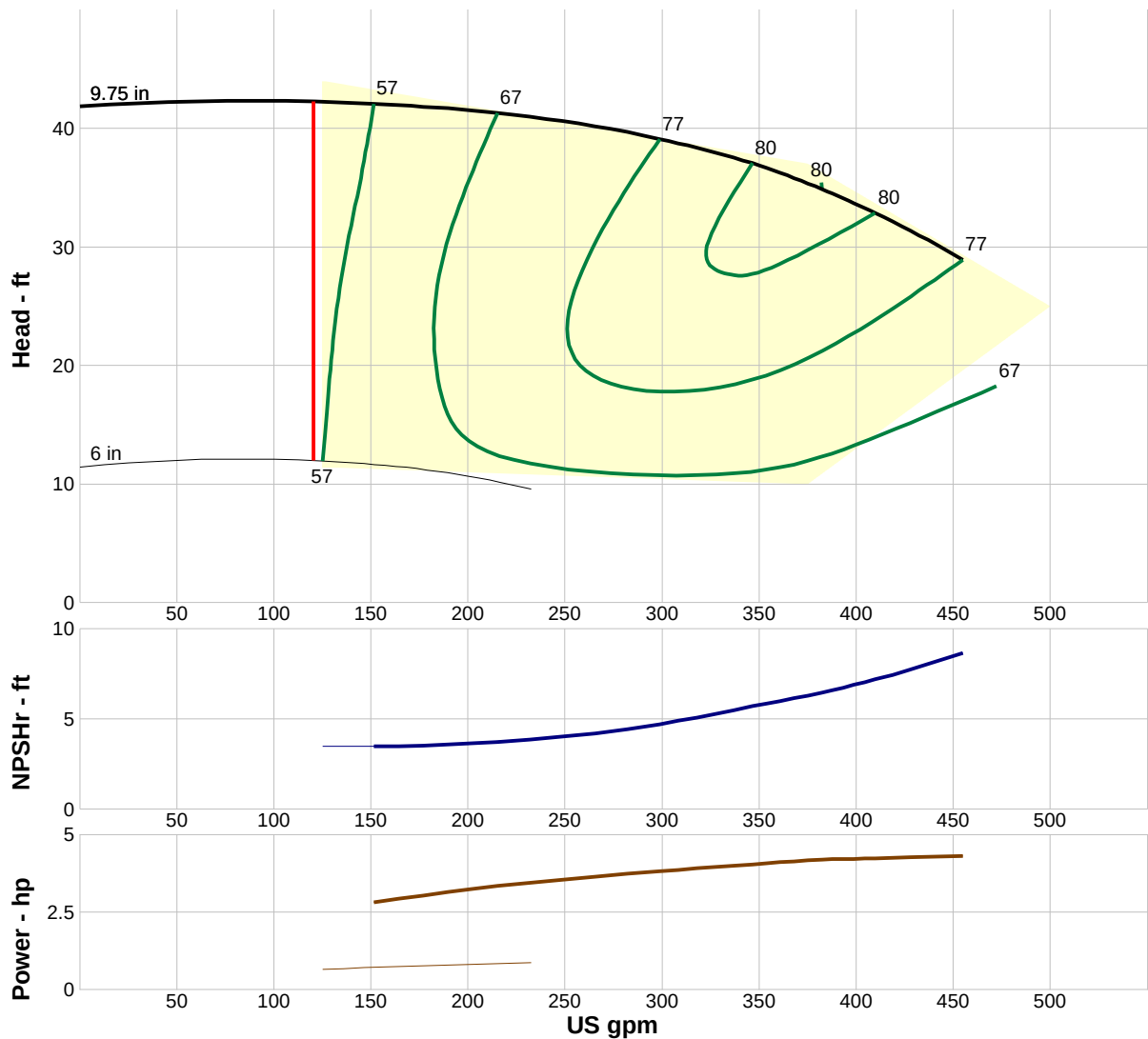
Fluid:

Water
 Density: 62.25 lb/ft³
 Viscosity: 1.105 cP
 NPSHa: --- ft
 Temperature: 60 °F
 Vapor pressure: 0.2563 psi a
 Atm pressure: 14.7 psi a

Motor:

Standard: NEMA
 Enclosure: TEFC
 Sizing criteria: Max Power on Design Curve
 Size: 5 hp
 Speed: 1200
 Frame: 215T

---- Data Point ----	
Flow:	382 US gpm
Head:	34.9 ft
Eff:	80%
Power:	4.2 hp
NPSHr:	6.48 ft
---- Design Curve ----	
Shutoff head:	41.8 ft
Shutoff dP:	18.1 psi
Min flow:	120 US gpm
BEP:	80% @ 382 US gpm
NOL power:	4.31 hp @ 455 US gpm
-- Max Curve --	
Max power:	4.31 hp @ 455 US gpm

**Performance Evaluation:**

Flow US gpm	Speed rpm	Head ft	Efficiency %	Power hp	NPSHr ft
437	1165	30.5	78	4.29	8.09
364	1165	36	80	4.12	6.09
291	1165	39.3	76	3.79	4.63
218	1165	41.2	67	3.36	3.77
146	1165	42.1	56	2.78	3.48