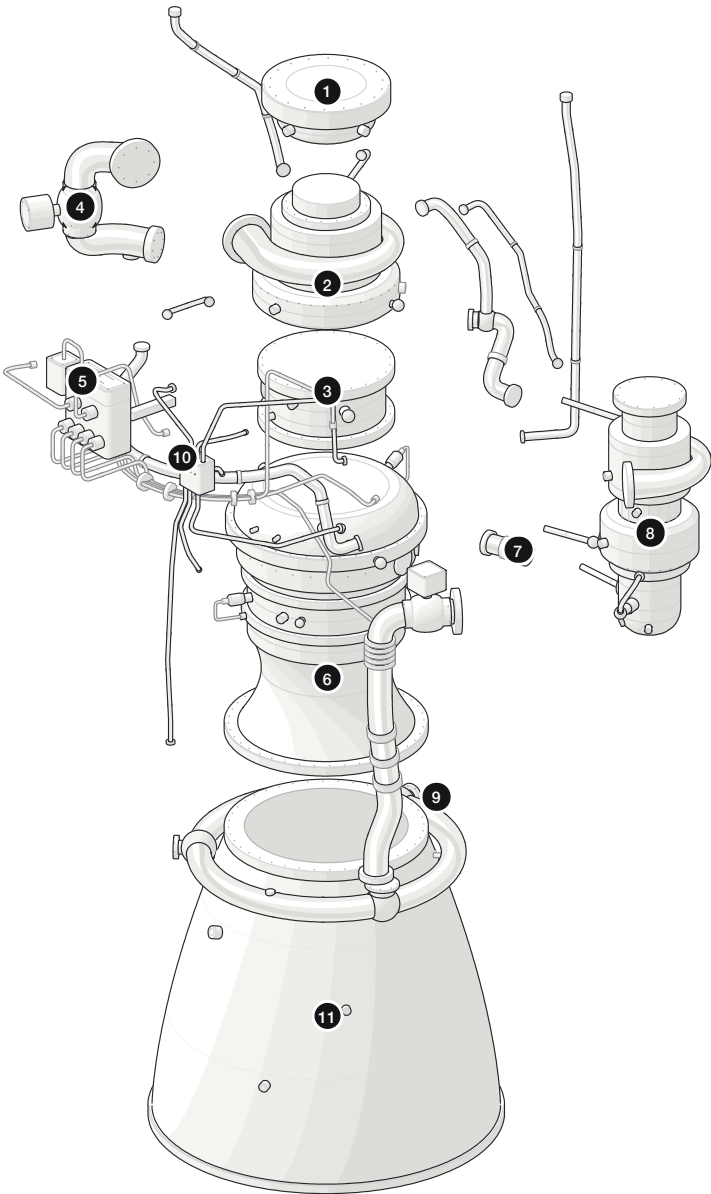


Raptor 2: how a rocket engine works

AN-001



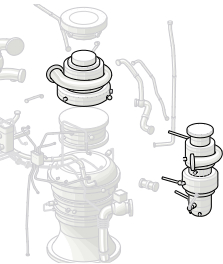
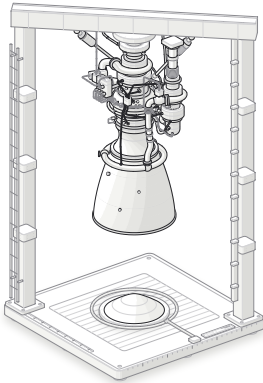
PARTS

- 01 Gimbal and thrust puck
- 02 Oxygen turbopump
- 03 Oxygen-rich preburner
- 04 Oxygen duct and main valve
- 05 Engine controller and harness
- 06 Injector and main chamber
- 07 Hot-gas manifold
- 08 Methane turbopump and fuel-rich preburner
- 09 Downcomer and main fuel valve
- 10 Plumbing
- 11 Nozzle

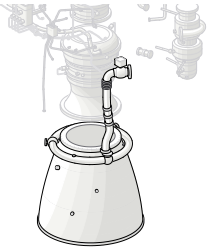
SPECIFICATION

Cycle	Full-flow staged combustion
Propellants	LOX / methane
Mixture	3.6 : 1
Chamber	300 bar
Thrust	230 tf, sea level
Exit	1.3 m
Dry mass	1,630 kg

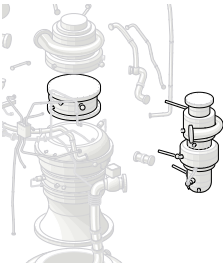
ASSEMBLED



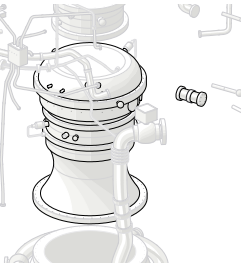
01
Pumps raise the pressure



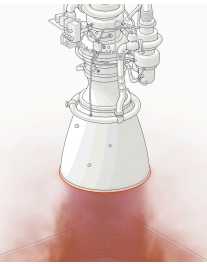
02
Methane cools the bell



03
Preburners spin the pumps



04
Hot gases meet



05
Thrust