

# ISO 17540:2025-10 (E)

## Space systems - Liquid rocket engines and test stands - Vocabulary

---

<b>Contents</b>		<b>Page</b>
Foreword .....		v
<b>1</b>	<b>Scope .....</b>	<b>1</b>
<b>2</b>	<b>Normative references .....</b>	<b>1</b>
<b>3</b>	<b>Terms and definitions .....</b>	<b>1</b>
3.1	General .....	1
3.2	Major engine units .....	2
3.3	Engine types based on the cycle configuration .....	2
3.4	Engine types by reusability and multiple-firing capability .....	2
3.5	Engine types by purpose .....	3
3.6	Thrusters types based on the cycle configuration .....	3
3.7	Basic parameters and performance characteristics of the engine .....	4
3.8	Engine time characteristics, types of operating time and operating life .....	7
3.9	Thruster performance characteristics .....	8
3.10	Engine operating modes .....	9
3.11	Operating modes of liquid-fuelled thruster .....	10
3.12	Components of the combustion chamber and gas generator .....	10
3.13	Engine nozzle types .....	12
3.14	Nozzle components .....	12
3.15	Nozzle characteristics .....	13
3.16	Nozzle operating modes .....	14
3.17	Nozzle flows .....	14
3.18	Turbopump: components .....	14
3.19	Pump characteristics .....	15
3.20	Turbopump performance characteristics .....	16
3.21	Engine control devices .....	16
3.22	Devices and methods to create the engine steering efforts .....	17
3.23	Engine cooling .....	17
3.24	Engine thermal protection .....	18
3.25	Engine test: general .....	18
3.26	Engine test types: thermal loads .....	18
3.27	Engine test types: by connection with the vehicle being moved .....	19
3.28	Engine test types: by test site .....	19
3.29	Engine test types: by organizational factor and test site .....	19
3.30	Engine test types: by test conditions .....	19
3.31	Engine test types: by accelerated data acquisition .....	19
3.32	Engine test types: by test purpose .....	19
3.33	Types of tests, specific for thrusters .....	20
3.34	Engine test procedures .....	21
3.35	Engine test conditions .....	21
3.36	Test results .....	22
3.37	Engine reliability .....	22
3.38	Engine defects .....	23
3.39	Engine failure modes .....	23
3.40	Engine operation .....	23
3.41	Engine health analysis .....	24
3.42	Engine reliability factors .....	24
3.43	Engine quality control .....	24
3.44	Structural and functional analysis of the engine reliability .....	25
3.45	Test stands: general .....	25

3.46	Test stand types .....	26
3.47	Stand systems .....	26
3.48	Post-test processing systems .....	28
3.49	Stand systems devices and components .....	28
3.50	Stand room .....	29
Index	.....	31