

## BUREAU OF INDIAN STANDARDS

### Program of Work

#### ETD 11 : Secondary Cells And Batteries

**Scope:** To prepare standards for all rechargeable cells and batteries (starter batteries, stationary batteries, traction batteries etc.)

**Liaison:** **IEC TC-21 (P): Secondary cells and batteries IEC TC-21 SC-21A (P): Secondary cells and batteries containing alkaline or other non-acid electrolytes IEC TC-21 (P): Secondary cells and batteries IEC TC-21 SC-21 (P): Secondary cells and batteries containing alkaline or other non-acid electrolytes**

### Published Standards

S.No	IS No.	TITLE	Reaffirm M-Y	No. of Amds	Eqv.
1	IS 10893:1984 <i>Reviewed In : 2018</i> Reaffirmed but not taken up for revision	Specification for sealed nickel cadmium button type rechargeable single cells	December, 2018	-	Indigenous
2	IS 10918:1984 <i>Reviewed In : 2018</i> Reaffirmed but not taken up for revision <i>Open nickel cadmium prismatic rechargeable cells. International Electrotechnical Commission. Specifici</i>	Specification for vented type nickel cadmium batteries	December, 2018	2	Modified/Technically Equivalent
3	IS 1146:1981 <i>Reviewed In : 2024</i>	Specification for rubber and plastics containers for lead - Acid storage batteries (Second Revision)	November, 2024	3	Indigenous
4	IS 12013:1987 <i>Reviewed In : 2017</i> Reaffirmed but not taken up for revision	Specification for lead acid batteries for 110 volts train lighting system with monobloc containers	September, 2017	-	Indigenous
5	IS 13300:1992 <i>Reviewed In : 2025</i> BS3G 205 : 1983 <i>Specification for lead-acid and nickel-cadmium rechargeable batteries. British Stand</i>	Nickel cadmium aircraft batteries (Aerobatic Andnon - Aerobatic) - Specification	June, 2025	-	Modified/Technically Equivalent
6	IS 13315:1992 <i>Reviewed In : 2025</i>	Nickel cadmium batteries for electric locomotives - Specification	June, 2025	-	Modified/Technically Equivalent

	IEC Pub 623 : 1983 Open nickel-cadmium prismatic rechargeable cells - Part 1: General requirements a				
7	IS 13369:2024	Stationary Lead-Acid Batteries with Tubular Positive Plates in Monobloc Container â€” Specification (First Revision)		-	Indigenous
8	IS 13514:2015 IEC 61982 : 2012 Reviewed In : 2024 IEC 61982 : 2012	Secondary batteries (Except Lithium) for the propulsion of electric road vehicles - Performance and endurance tests (First Revision)	August, 2024	-	Identical under dual numbering
9	IS 13514 (Part 4):2018 IEC 61982-4 : 2015 Reviewed In : 2024 IEC 61982-4 : 2015	Secondary Batteries (Except Lithium) for the Propulsion of Electric Road Vehicles Part 4 Safety Requirements of Nickel-Metal Hydride Cells and Modules	August, 2024	-	Identical under dual numbering
10	IS 13568:1992 Reviewed In : 2024	Lead acid light weight storage batteries for motor cycles and similar vehicles fitted with ac circuitry - Specification	August, 2024	1	Indigenous
11	IS 13595:1992 Reviewed In : 2017 Reaffirmed but not taken up for revision HAL Nasik Specification TS/IND/72 117 A/C Storage battery 15-ST5-45B and 15-SST5-45B b) JSS 55555 E	Silver oxide zinc batteries for aircraft - Specification	September, 2017	-	Modified/Technically Equivalent
12	IS 14217:1994 Reviewed In : 2018 Reaffirmed but not taken up for revision BS 4945 : 1973	Miners cap lamp batteries (Alkaline Type) - Specification	December, 2018	-	Modified/Technically Equivalent
13	IS 14218:1994 Reviewed In : 2018 Reaffirmed but not taken up for revision	Sealed cylindrical type rechargeable nickel cadmium cells - Specification	December, 2018	-	Indigenous
14	IS 14257:2019 NULL Reviewed In : 2024	Lead - Acid storage batteries for motor vehicles with light weight and high cranking performance - Specification (First Revision)	August, 2024	-	Indigenous
15	IS 14782:2000 Reviewed In : 2020	Code of practice for maintenance and testing of large lead acid batteries for generating stations and substations	May, 2020	-	Indigenous
16	IS 15549:2005 Reviewed In : 2020 a) IEC 60896-2 ( 1995 ) Stationary lead acid batteries - General	Stationary valve regulated lead acid batteries - Specification	June, 2020	3	Modified/Technically Equivalent

	requirements and test methods - Par				
17	IS 15767:2008 IEE 62259 : 2003 Reviewed In : 2024 IEC 62259 : 2003	Secondary cells and batteries containing alkaline or other non - Acid electrolytes - Nickel - Cadmium prismatic secondary single cells with partial gas recombination	August, 2024	-	Identical under dual numbering
18	IS 16046 (Part 1):2018 IEC 62133-1 : 2017 Reviewed In : 2024 IEC 62133-1 : 2017	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes - Safety Requirements for Portable Sealed Secondary Cells and for Batteries Made from Them for Use in Portable Applications Part 1 Nickel Systems ( Second Revision )	August, 2024	1	Identical under dual numbering
19	IS 16046 (Part 2):2018 IEC 62133-2 : 2017 Reviewed In : 2024 IEC 62133-2 : 2017	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes - Safety Requirements for Portable Sealed Secondary Cells and for Batteries Made from Them for Use in Portable Applications Part 2 Lithium Systems ( Second Revision )	August, 2024	1	Identical under dual numbering
20	IS 16047 (Part 3):2018  Reviewed In : 2024 IEC 61960-3:2017	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes - Secondary Lithium Cells and Batteries for Portable Applications Part 3 Prismatic and Cylindrical Lithium Secondary Cells, and Batteries Made From Them ( First Revision )	September, 2024	-	Identical under dual numbering
21	IS 16048 (Part 1):2021 61951-1 61951-1	SECONDARY CELLS AND BATTERIES CONTAINING ALKALINE OR OTHER NON-ACID ELECTROLYTES SECONDARY SEALED CELLS AND BATTERIES FOR PORTABLE APPLICATIONS PART 1: NICKEL-CADMIUM		-	Identical under dual numbering
22	IS 16048 (Part 2):2021 61951-2 : 2017 61951-2 : 2017	SECONDARY CELLS AND BATTERIES CONTAINING ALKALINE OR OTHER NON-ACID ELECTROLYTES SECONDARY SEALED CELLS AND BATTERIES FOR PORTABLE APPLICATIONS PART 2: NICKEL-METAL HYDRIDE		-	Identical under dual numbering
23	IS 16049:2013 IEC 60622 : 2002 Reviewed In : 2023 IEC 60622 : 2002	Secondary cells and batteries containing alkaline or other non - Acid electrolytes - Sealed nickel - Cadmium prismatic rechargeable single cells	May, 2023	-	Identical under dual numbering
24	IS 16220 (Part 1):2015	General purpose lead - Acid batteries (Valve - Regulated	August, 2020	-	Identical under dual numbering

	IEC 61056-1 : 2012 Reviewed In : 2020 IEC 61056-1 : 2012	Types): Part 1 general requirements, functional characteristics - Methods of test			
25	IS 16220 (Part 2):2017 IEC 61056-2 : 2012 Reviewed In : 2024 IEC 61056-2 : 2012	General Purpose Lead-Acid Batteries (Valve-Regulated Types) Part 2 Dimensions, Terminals and Marking	August, 2024	-	Identical under dual numbering
26	IS 16270:2014 Reviewed In : 2019	Secondary cells and batteries for solar photovoltaic application - General requirements and methods of test		-	Indigenous
27	IS 16270:2023	Secondary cells and batteries for solar photovoltaic application - General requirements and methods of test		1	Indigenous
28	IS 16284 :2018 IEC 62675 : 2014 IEC 62675 : 2014	Secondary Cells and Batteries Containing Alkaline or Other Non - Acid Electrolytes - Sealed Nickel - Metal Hydride Prismatic Rechargeable Single Cells		-	Identical under dual numbering
29	IS 16373:2015 Reviewed In : 2020 IEC 60095-1 (2006)	Lead acid storage batteries for motor vehicles - Valve regulated type	August, 2020	1	Modified/Technically Equivalent
30	IS 1651:2013 Reviewed In : 2025	Stationary cells and batteries, lead - Acid type (With Tubular Positive Plates) - Specification (Fourth Revision)	March, 2025	-	Indigenous
31	IS 1652:2013 Reviewed In : 2024	Stationary cells and batteries, lead - Acid type with plante positive plates - Specification (Fourth Revision)	August, 2024	1	Indigenous
32	IS 16805:2018 IEC 62619 : 2017 Reviewed In : 2024 IEC 62619 : 2017	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes - Safety Requirements for Secondary Lithium Cells and Batteries, for Use in Industrial Applications	September, 2024	-	Identical under dual numbering
33	IS 16822:2019 IEC 62620 : 2014 Reviewed In : 2024 IEC 62620:2014	Secondary cells and batteries containing alkaline or other non - Acid electrolytes - Secondary lithium cells and batteries for use in industrial applications	August, 2024	-	Identical under dual numbering
34	IS 16823:2019 IEC 61959 : 2004 Reviewed In : 2024 IEC 61959 : 2004	Secondary cells and batteries containing alkaline or other non - acid electrolytes - Mechanical tests for sealed portable secondary cells and batteries	August, 2024	-	Identical under dual numbering
35	IS 16825:2018 IEC TR 62060 IEC TR 62060:2001	Secondary Cells and Batteries - Monitoring of Lead Acid Stationary Batteries - User Guide		-	Identical under dual numbering
36	IS 16827:2018 ISO/IEC PAS 16898 : 2012 ISO/IEC 16898 : 201	Electrically propelled road vehicles - Dimensions and designation of secondary lithium - Ion cells		-	Identical under dual numbering
37	IS 16893 (Part 1):2018	Secondary lithium - Ion cells for the propulsion of electric road	August, 2024	-	Identical under dual numbering

	IEC 62660-1 : 2010 Reviewed In : 2024 IEC 62660-1: 2010	vehicles: Part 1 performance testing			
38	IS 16893 (Part 2):2018 IEC 62660-2 : 2010 Reviewed In : 2024 IEC 62660-2: 2010	Secondary lithium - Ion cells for the propulsion of electric road vehicles: Part 2 reliability and abuse testing	August, 2024	-	Identical under dual numbering
39	IS 16893 (Part 3):2018 IEC 62660-3 : 2016 Reviewed In : 2024 IEC 62660-3 : 2016	Secondary Lithium - Ion Cells For the Propulsion of Electric Road Vehicles Part 3 Safety Requirements	August, 2024	-	Identical under dual numbering
40	IS 16894 (Part 1):2018 IEC 62485-1 : 2015 Reviewed In : 2024 IEC 62485-1:2015	Safety requirements for secondary batteries and battery installations: Part 1 general safety information	August, 2024	-	Identical under dual numbering
41	IS 16894 (Part 2):2018 IEC 62485-2 : 2010 Reviewed In : 2024 IEC 62485-2:2010	Safety requirements for secondary batteries and battery installations: Part 2 stationary batteries	September, 2024	-	Identical under dual numbering
42	IS 16894 (Part 3):2018 IEC 62485-3 : 2014 Reviewed In : 2024 IEC 62485-3:2014	Safety requirements for secondary batteries and battery installations: Part 3 traction batteries	September, 2024	-	Identical under dual numbering
43	IS 16894 (Part 4):2018 IEC 62485-4 : 2015 Reviewed In : 2024 IEC 62485-4:2015	Safety Requirements for Secondary Batteries and Battery Installations Part 4 Valve - Regulated Lead - Acid Batteries for use in Portable Appliances	September, 2024	-	Identical under dual numbering
44	IS 17882:2025	ADVANCED CHEMISTRY CELLS - METHOD OF TESTS (First Revision)		-	Indigenous
45	IS 19095 (Part 1):2025 IEC 62932-1 : 2020 IEC 62932-1 : 2020	Flow Battery Energy Systems for Stationary Applications Part 1 Terminology and General Aspects		-	Identical under dual numbering
46	IS 19095 (Part 2/Sec 1):2025 IEC 62932-2-1 : 2020 IEC 62932-2-1 : 2020	Flow Battery Energy Systems for Stationary Applications Part 2 Requirements Section 1 General Performance and Test Methods		-	Identical under dual numbering
47	IS 19095 (Part 2/Sec 2):2025 IEC 62932-2-2 : 2020 IEC 62932-2-2 : 2020	Flow Battery Energy Systems for Stationary Applications Part 2 Requirements Section 2 Safety		-	Identical under dual numbering
48	IS 19142:2025 IEC 62902 : 2019 IEC 62902 : 2019	Secondary Cells and Batteries - Marking Symbols for Identification of Their Chemistry		-	Identical under dual numbering
49	IS 2512:1978 Reviewed In : 2018 Reaffirmed but not taken up for revision	Specification for miners cap - Lamp batteries (Lead - Acid Type) (First Revision)	December, 2018	4	Modified/Technically Equivalent

	<b>BS 4945 : 1973</b>				
50	IS 5154 (Part 1):2013 IEC 60254-1 : 2005 <b>Reviewed In : 2024</b> <b>IEC 60254-1 : 2005</b>	Lead - Acid traction batteries: Part 1 general requirements and methods of test (Second Revision)	September, 2024	-	Identical under dual numbering
51	IS 5154 (Part 2):2013 IEC 60254-2 : 2008 <b>Reviewed In : 2024</b> <b>IEC 60254-2 : 2008</b>	Lead - Acid traction batteries: Part 2 dimensions of cells and terminals and marking of polarity on cells (Second Revision)	September, 2024	-	Identical under dual numbering
52	IS 6071:1986 <b>Reviewed In : 2024</b>	Specification for synthetic separators for lead - Acid batteries (First Revision)	August, 2024	2	Indigenous
53	IS/IEC 62282-3-100):2019 IEC 62282-3-100: 2019 <b>IEC 62282-3-100: 2019</b>	Fuel Cell Technologies Part 3 Stationary Fuel Cell Power Systems Section 100 Safety		-	Identical under single numbering
54	IS 6304:2024	Stationary Batteries "Lead-Acid Batteries with Pasted Positive Plates" Specification (Third Revision)		-	Indigenous
55	IS 6848:1979 <b>Reviewed In : 2018</b> Reaffirmed but not taken up for revision <b>IEC Publication : 77 * ( 1968 )</b>	Specification for lead - Acid batteries for train lighting and airconditioning services (First Revision)	December, 2018	3	Identical under dual numbering
56	IS 7624:1990 <b>Reviewed In : 2018</b> Reaffirmed but not taken up for revision	Lead - Acid starter batteries for diesel - locomotives and rail cars - Specification (First Revision)	December, 2018	-	Indigenous
57	IS 7660:1988 <b>Reviewed In : 2018</b> Reaffirmed but not taken up for revision	Specification for lead - Acid batteries for electric locomotives and electrical multiple units (First Revision)	December, 2018	-	Indigenous
58	IS 8320:2000 <b>Reviewed In : 2020</b>	General requirements and methods of tests for lead - Acid storage batteries (Second Revision)	July, 2020	-	Indigenous
59	IS 9814:1981 <b>Reviewed In : 2024</b>	Specification for lead - Acid storage batteries for marine use	November, 2024	-	Indigenous

### Standards under Development

#### Projects Approved

SI. No.	Doc No.	Title
<i>No Records Found</i>		

#### Preliminary Draft Standards

SI. No.	Doc No.	Title
<i>No Records Found</i>		

### Drafts Standards in WC Stage

SI. No.	Doc No.	Title
1	ETD 11 (27747)	GENERAL SAFETY AND PERFORMANCE REQUIREMENTS OF BATTERIES TO BE USED IN UNCREWED AIRCRAFTDRONE APPLICATION
2	ETD 11 (32817)	Lithium ion battery for space vehicles Design and verification requirements
3	ETD 11 (32974)	Lithium ion battery for space vehicles Design and verification requirements
4	ETD 11 (32993)	Nickel cadmium batteries for electric locomotives - Specification
5	ETD 11 (32994)	Lead-acid starter batteries Part 1 General requirements and methods of test
6	ETD 11 (32995)	Specification for vented type nickel cadmium batteries
7	ETD 11 (32997)	Lead acid light weight storage batteries for motor cycles and similar vehicles fitted with ac circuitry - Specification
8	ETD 11 (32999)	A test method standard for thermal runaway propagation of batteries
9	ETD 11 (33000)	General guidance on reuse and repurposing of secondary batteries
10	ETD 11 (33285)	AMENDMENT NO 2 DECEMBER 2025 To SECONDARY CELLS AND BATTERIES CONTAINING ALKALINE OR OTHER NON-ACID ELECTROLYTES SAFETY REQUIREMENTS FOR PORTABLE SEALED SECONDARY CELLS AND FOR BATTERIES MADE FROM THEM FOR USE IN PORTABLE APPLICATIONS PART 2 LITHIUM SYSTEMS
11	ETD 11 (33354)	Secondary sodium-ion cells for the propulsion of electric road vehicles - Part 1 Performance testing
12	ETD 11 (33355)	Secondary cells and batteries containing alkaline or other non-acid electrolytes - Safety requirements for secondary sodium ion cells and batteries for use in industrial applications
13	ETD 11 (33358)	Secondary cells and batteries containing alkaline or other non-acid electrolytes - Secondary sodium ion cells and batteries for use in industrial applications
14	ETD 11 (33359)	Secondary sodium-ion cells for the propulsion of electric road vehicles - part 2 Safety requirements and test methods

### Draft Standards Completed WC Stage

SI. No.	Doc No.	Title
<i>No Records Found</i>		

### Finalized Draft Indian Standard

SI. No.	Doc No.	Title
1	ETD 11 (27827)	Stationary cells and batteries lead - Acid type With Tubular Positive Plates - Specification Fourth Revision Amendment - 1
2	ETD 11 (28223) Revision of: IS 16805:2018	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes Safety Requirements for Secondary Lithium Cells and Batteries For Use in Industrial Applications First Revision
3	ETD 11 (28227) Revision of: IS 16893:2018	Secondary Lithium-Ion Cells for the Propulsion of Electric Road Vehicles Part 1 Performance Testing First Revision
4	ETD 11 (28228) Revision of: IS 16893:2018	Secondary Lithium-Ion Cells for the Propulsion of Electric Road Vehicles Part 2 Reliability and Abuse Testing First Revision
5	ETD 11 (28229) Revision of: IS 16893:2018	Secondary Lithium-Ion Cells for the Propulsion of Electric Road Vehicles Part 3 Safety Requirements First Revision
6	ETD 11 (28253)	Lead - acid batteries for propulsion power of lightweight vehicles general requirements and methods of test
7	ETD 11 (28255)	Aircraft batteries - Part 1 general test requirements and performance levels

### Finalized Draft Indian Standards under Print

SI. No.	Doc No.	Title
1	ETD 11 (10976)	Secondary batteries except lithium for the propulsion of electric road vehicles - Part 4 Safety requirements of nickel-metal hydride cells and modules
2	ETD 11 (10977)	Secondary cells and batteries - Monitoring of lead acid stationary batteries - User guide
3	ETD 11 (10978)	Safety requirements for secondary batteries and battery installations - Part 1 General safety information

4	ETD 11 (10979)	Safety requirements for secondary batteries and battery installations - Part 2 Stationary batteries
5	ETD 11 (10980)	Safety requirements for secondary batteries and battery installations - Part 3 Traction batteries
6	ETD 11 (10981)	Safety requirements for secondary batteries and battery installations - Part 4 Valve-regulated lead-acid batteries for use in portable appliances
7	ETD 11 (10982)	Secondary lithium-ion cells for the propulsion of electric road vehicles - Part 1 Performance testing
8	ETD 11 (10983)	Secondary lithium-ion cells for the propulsion of electric road vehicles - Part 2 Reliability and abuse testing
9	ETD 11 (10984)	Electrically propelled road vehicles -- Dimensions and designation of secondary lithium-ion cells
10	ETD 11 (10986)	Secondary cells and batteries containing alkaline or other non-acid electrolytes - Mechanical tests for sealed portable secondary cells and batteries
11	ETD 11 (10987)	Secondary cells and batteries containing alkaline or other non-acid electrolytes - Secondary lithium cells and batteries for use in industrial applications
12	ETD 11 (10988)	Secondary cells and batteries containing alkaline or other non-acid electrolytes - Sealed nickel-metal hydride prismatic rechargeable single cells
13	ETD 11 (11295) Revision of: IS 14257:2019	LEAD-ACID STORAGE BATTERIES FOR MOTOR VEHICLES WITH LIGHT WEIGHT AND HIGH CRANKING PERFORMANCE SPECIFICATION
14	ETD 11 (11369)	Stationary Regulated Lead Acid Batteries Amendment - 3
15	ETD 11 (11525) Revision of: IS 16046:2015	Secondary cells and batteries containing alkaline or other non-acid electrolytes Safety requirements for portable sealed secondary cells and for batteries made from them for use in for portable applications - Part 1 Nickel Systems IEC 62133-1 201
16	ETD 11 (11526) Revision of: IS 16046:2015	Secondary cells and batteries containing alkaline or other non-acid electrolytes Safety requirements for portable sealed secondary cells and for batteries made from them for use in portable applications them for use in for portable applications P
17	ETD 11 (11527) Revision of: IS 16047:2012	Secondary cells and batteries containing alkaline or other non-acid electrolytes Secondary lithium cells and batteries for portable applications Part 3 Prismatic and cylindrical lithium secondary cells and batteries made from them First Revision
18	ETD 11 (11528)	Secondary lithium-ion cells for the propulsion of electric road vehicles Part 3 Safety requirements
19	ETD 11 (11529)	Secondary cells and batteries containing alkaline or other non-acid electrolytes Safety requirements for secondary lithium cells and batteries for use in industrial applications
20	ETD 11 (13596) Revision of: IS 16048:2013	SECONDARY CELLS AND BATTERIES CONTAINING ALKALINE OR OTHER NON-ACID ELECTROLYTES SECONDARY SEALED CELLS AND BATTERIES FOR PORTABLE APPLICATIONS PART 1 NICKEL-CADMIUM
21	ETD 11 (13597) Revision of: IS 16048:2013	SECONDARY CELLS AND BATTERIES CONTAINING ALKALINE OR OTHER NON-ACID ELECTROLYTES SECONDARY SEALED CELLS AND BATTERIES FOR PORTABLE APPLICATIONS PART 2 NICKEL-METAL HYDRIDE
22	ETD 11 (14501)	Amendment no 1 to Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes Safety Requirements for Portable Sealed Secondary Cells and for Batteries Made from Them for Use in Portable Applications Part 2 Lithium Systems Second Revision
23	ETD 11 (14502)	Amendment no 1 to Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes Safety Requirements for Portable Sealed Secondary Cells and for Batteries Made from Them for Use in Portable Applications Part 1 Nickel Systems Second Revision
24	ETD 11 (15802) Revision of: IS 16270:2014	Secondary cells and batteries for solar photovoltaic application - General requirements and methods of test
25	ETD 11 (18132)	Methods of test for measurement of Energy density and Cycle life of Advanced Chemistry Cells ACCs
26	ETD 11 (18838)	Lead acid storage batteries for motor vehicles - Valve regulated type Amendment - 1
27	ETD 11 (21547) Revision of: IS 13369:1992	Stationary Lead-Acid Batteries with Tubular Positive Plates in Monobloc Container - Specification First Revision
28	ETD 11 (21558) Revision of: IS 6304:1992	Stationary Batteries Lead-Acid Batteries with Pasted Positive Plates - Specification Third Revision
29	ETD 11 (22944)	Fuel Cell Technologies Part 3 Stationary Fuel Cell Power Systems Section 100 Safety
30	ETD 11 (25991)	Stationary cells and batteries lead - Acid type with plante positive plates - Specification Fourth Revision Amendment - 1
31	ETD 11 (26093)	Secondary Cells and Batteries - Marking Symbols for Identification of Their Chemistry
32	ETD 11 (26094)	Flow Battery Energy Systems for Stationary Applications Part 2 Requirements Section 2 Safety
33	ETD 11 (26095)	Flow Battery Energy Systems for Stationary Applications Part 2 Requirements Section 1 General Performance and Test Methods
34	ETD 11 (26097)	Flow Battery Energy Systems for Stationary Applications Part 1 Terminology and General Aspects

35	ETD 11 (26916) Revision of: IS 17882:2022	ADVANCED CHEMISTRY CELLS METHOD OF TESTS First Revision
36	ETD 11 (27414) Revision of: IS 1146:1981	Rubber and Plastics Containers for Lead-Acid Storage Batteries Specification Third Revision
37	ETD 11 (27714) Revision of: IS 9814:1981	SPECIFICATION FOR LEAD - ACID STORAGE BATTERIES FOR MARINE USE
38	ETD 11 (27943)	Secondary cells and batteries for solar photovoltaic application - General requirements and methods of test Amendment - 1
39	ETD 11 (33629)	Lead - Acid storage batteries for motor vehicles with light weight and high cranking performance - Specification First Revision

**Total Published Standards:53 Total Standards Under development:60**

### Aspect Wise Report

Product : 41  
Code of Practices : 3  
Methods of Test : 7  
Terminology : 2  
Dimensions : 3  
System Standard : 0  
Safety Standard : 0  
Others : 2  
Service Specification : 0  
Process Specification : 0  
Unclassified : 0

### Annexure-I :List of Indian Standards Withdrawn/Superseded

Sl. No.	IS No. & Year	Title
1	IS 1145:1980 Reviewed In : 2014	Lead-acid storage batteries for motor cycles auto-rickshaws and similar vehicles
2	IS 12956:1990 Reviewed In : 2002	Sealed cylindrical type rechargeable nickel cadmium cells Regular standard being prepared
3	IS 16046:2015 IEC 62133 : 2012 IEC 62133 : 2012	Secondary Cells and Batteries Containing Alkaline or Other Non-acid Electrolytes - Safety Requirements for Portable Sealed Secondary Cells and for Batteries Made from them for Use in Portable Applications First Revision
4	IS 16047:2012 IEC 61960 : 2011 Reviewed In : 2017 IEC 61960 : 2011	Secondary Cells and Batteries containing Alkaline or other non-acid Electrolytes - Secondary Lithium Cells and Batteries for Portable Applications
5	IS 1846:1992	Lead-acid aircraft batteries aerobatic and non-aerobatic
6	IS 395:1962	Lead-acid storage battery for motor vehicles
7	IS 5154:1980 IEC 254 Reviewed In : 2008	Lead-acid Traction Batteries
8	IS 541:1954	Stationary accumulators lead-acid type
9	IS 7372:1995 Reviewed In : 2017	Lead - Acid storage batteries for motor vehicles - Specification First Revision
10	IS 985:1962	Lead-acid storage batteries for motor vehicles special

### Annexure-II :List of Indian Product Standards

Sl. No.	IS No. & Year	Title
		Specification for sealed nickel cadmium button type rechargeable single cells

1	IS 10893:1984 Reviewed In : 2018 Reaffirmed but not taken up for revision	
2	IS 10918:1984 Reviewed In : 2018 Reaffirmed but not taken up for revision Open nickel cadmium prismatic rechargeable cells. International Electrotechnical Commission. Specifici	Specification for vented type nickel cadmium batteries
3	IS 1146:1981 Reviewed In : 2024	Specification for rubber and plastics containers for lead - Acid storage batteries Second Revision
4	IS 12013:1987 Reviewed In : 2017 Reaffirmed but not taken up for revision	Specification for lead acid batteries for 110 volts train lighting system with monobloc containers
5	IS 13300:1992 Reviewed In : 2025 BS3G 205 : 1983 Specification for lead-acid and nickel-cadmium rechargeable batteries. British Stand	Nickel cadmium aircraft batteries Aerobatic Andnon - Aerobatic - Specification
6	IS 13315:1992 Reviewed In : 2025 IEC Pub 623 : 1983 Open nickel-cadmium prismatic rechargeable cells - Part 1: General requirements a	Nickel cadmium batteries for electric locomotives - Specification
7	IS 13369:2024	Stationary Lead-Acid Batteries with Tubular Positive Plates in Monobloc Container Specification First Revision
8	IS 13514:2015 IEC 61982 : 2012 Reviewed In : 2024 IEC 61982 : 2012	Secondary batteries Except Lithium for the propulsion of electric road vehicles - Performance and endurance tests First Revision
9	IS 13514 (Part 4):2018 IEC 61982-4 : 2015 Reviewed In : 2024 IEC 61982-4 : 2015	Secondary Batteries Except Lithium for the Propulsion of Electric Road Vehicles Part 4 Safety Requirements of Nickel-Metal Hydride Cells and Modules
10	IS 13568:1992 Reviewed In : 2024	Lead acid light weight storage batteries for motor cycles and similar vehicles fitted with ac circuitry - Specification
11	IS 13595:1992 Reviewed In : 2017 Reaffirmed but not taken up for revision HAL Nasik Specification TS/IND/72 117 A/C Storage battery 15-ST5-45B and 15-SST5-45B b) JSS 55555 E	Silver oxide zinc batteries for aircraft - Specification
12	IS 14217:1994 Reviewed In : 2018 Reaffirmed but not taken up for revision BS 4945 : 1973	Miners cap lamp batteries Alkaline Type - Specification
13	IS 14218:1994 Reviewed In : 2018 Reaffirmed but not taken up for revision	Sealed cylindrical type rechargeable nickel cadmium cells - Specification

14	IS 14257:2019 NULL Reviewed In : 2024	Lead - Acid storage batteries for motor vehicles with light weight and high cranking performance - Specification First Revision
15	IS 15549:2005 Reviewed In : 2020 a) IEC 60896-2 ( 1995 ) Stationary lead acid batteries - General requirements and test methods - Par	Stationary valve regulated lead acid batteries - Specification
16	IS 15767:2008 IEe 62259 : 2003 Reviewed In : 2024 IEC 62259 : 2003	Secondary cells and batteries containing alkaline or other non - Acid electrolytes - Nickel - Cadmium prismatic secondary single cells with partial gas recombination
17	IS 16046 (Part 1):2018 IEC 62133-1 : 2017 Reviewed In : 2024 IEC 62133-1 : 2017	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes - Safety Requirements for Portable Sealed Secondary Cells and for Batteries Made from Them for Use in Portable Applications Part 1 Nickel Systems Second Revision
18	IS 16046 (Part 2):2018 IEC 62133-2 : 2017 Reviewed In : 2024 IEC 62133-2 : 2017	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes - Safety Requirements for Portable Sealed Secondary Cells and for Batteries Made from Them for Use in Portable Applications Part 2 Lithium Systems Second Revision
19	IS 16047 (Part 3):2018 Reviewed In : 2024 IEC 61960-3:2017	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes - Secondary Lithium Cells and Batteries for Portable Applications Part 3 Prismatic and Cylindrical Lithium Secondary Cells and Batteries Made From Them First Revision
20	IS 16048 (Part 1):2021 61951-1 ISO 12647-9: 2021	SECONDARY CELLS AND BATTERIES CONTAINING ALKALINE OR OTHER NON-ACID ELECTROLYTES SECONDARY SEALED CELLS AND BATTERIES FOR PORTABLE APPLICATIONS PART 1 NICKEL-CADMIUM
21	IS 16048 (Part 2):2021 61951-2 : 2017 ISO 25539:2020	SECONDARY CELLS AND BATTERIES CONTAINING ALKALINE OR OTHER NON-ACID ELECTROLYTES SECONDARY SEALED CELLS AND BATTERIES FOR PORTABLE APPLICATIONS PART 2 NICKEL-METAL HYDRIDE
22	IS 16049:2013 IEC 60622 : 2002 Reviewed In : 2023 IEC 60622 : 2002	Secondary cells and batteries containing alkaline or other non - Acid electrolytes - Sealed nickel - Cadmium prismatic rechargeable single cells
23	IS 16270:2023	Secondary cells and batteries for solar photovoltaic application - General requirements and methods of test
24	IS 16284 :2018 IEC 62675 : 2014 IEC 62675 : 2014	Secondary Cells and Batteries Containing Alkaline or Other Non - Acid Electrolytes - Sealed Nickel - Metal Hydride Prismatic Rechargeable Single Cells
25	IS 16373:2015 Reviewed In : 2020 IEC 60095-1 (2006)	Lead acid storage batteries for motor vehicles - Valve regulated type
26	IS 1651:2013 Reviewed In : 2025	Stationary cells and batteries lead - Acid type With Tubular Positive Plates - Specification Fourth Revision
27	IS 1652:2013 Reviewed In : 2024	Stationary cells and batteries lead - Acid type with plante positive plates - Specification Fourth Revision
28	IS 16805:2018 IEC 62619 : 2017 Reviewed In : 2024 IEC 62619 : 2017	Secondary Cells and Batteries Containing Alkaline or Other Non-Acid Electrolytes - Safety Requirements for Secondary Lithium Cells and Batteries for Use in Industrial Applications
29	IS 16822:2019 IEC 62620 : 2014 Reviewed In : 2024 IEC 62620:2014	Secondary cells and batteries containing alkaline or other non - Acid electrolytes - Secondary lithium cells and batteries for use in industrial applications
30	IS 16893 (Part 3):2018 IEC 62660-3 : 2016 Reviewed In : 2024 IEC 62660-3 : 2016	Secondary Lithium - Ion Cells For the Propulsion of Electric Road Vehicles Part 3 Safety Requirements

31	IS 16894 (Part 2):2018 IEC 62485-2 : 2010 Reviewed In : 2024 IEC 62485-2:2010	Safety requirements for secondary batteries and battery installations Part 2 stationary batteries
32	IS 16894 (Part 3):2018 IEC 62485-3 : 2014 Reviewed In : 2024 IEC 62485-3:2014	Safety requirements for secondary batteries and battery installations Part 3 traction batteries
33	IS 16894 (Part 4):2018 IEC 62485-4 : 2015 Reviewed In : 2024 IEC 62485-4:2015	Safety Requirements for Secondary Batteries and Battery Installations Part 4 Valve - Regulated Lead - Acid Batteries for use in Portable Appliances
34	IS 19095 (Part 2/Sec 2):2025 IEC 62932-2-2 : 2020	Flow Battery Energy Systems for Stationary Applications Part 2 Requirements Section 2 Safety
35	IS 5154 (Part 1):2013 IEC 60254-1 : 2005 Reviewed In : 2024 IEC 60254-1 : 2005	Lead - Acid traction batteries Part 1 general requirements and methods of test Second Revision
36	IS/IEC 62282-3-100):2019 IEC 62282-3-100: 2019	Fuel Cell Technologies Part 3 Stationary Fuel Cell Power Systems Section 100 Safety
37	IS 6304:2024	Stationary Batteries Lead-Acid Batteries with Pasted Positive Plates Specification Third Revision
38	IS 6848:1979 Reviewed In : 2018 Reaffirmed but not taken up for revision IEC Publication : 77 * ( 1968 )	Specification for lead - Acid batteries for train lighting and airconditioning services First Revision
39	IS 7624:1990 Reviewed In : 2018 Reaffirmed but not taken up for revision	Lead - Acid starter batteries for diesel - locomotives and rail cars - Specification First Revision
40	IS 7660:1988 Reviewed In : 2018 Reaffirmed but not taken up for revision	Specification for lead - Acid batteries for electric locomotives and electrical multiple units First Revision
41	IS 9814:1981 Reviewed In : 2024	Specification for lead - Acid storage batteries for marine use