BUREAU OF INDIAN STANDARDS

Program of Work

LITD 33: Wearable electronic devices and technologies

Scope: Standardization in the field of (i) wearable electronic devices and technologies which include

patchable materials and devices, implantable materials and devices, ingestible materials and devices, and electronic textile materials and devices, and (ii) printed electronics - terminology,

materials, processes, equipment, products and health/ safety/ sustainability

Liaison: IEC TC-IEC TC 124 (P): Wearable electronic devices and technologies IEC TC-IEC

TC (P): Printed Electronics

Published Standards

S.No	IS No.	TITLE	Reaffirm M-Y	No. of Amds	Eqv.
1	IS/IEC	Wearable Electronic Devices and		-	Identical under single
	63203-101-1):2021	Technologies Part 101: Section1:			numbering
IEC		Terminology			
	63203-101-1:2021				
	IEC				
	63203-101-1:2021				
2	IS/IEC	Wearable Electronic Devices and		-	Identical under single
	63203-201-1):2022	Technologies Part 201: Electronic			numbering
	IEC 63203-201-1:	Textile Section 1: Measurement			
	2022	Methods for Basic Properties of			
	IEC 63203-201-1:	Conductive Yarns			
	2022				
3	IS/IEC	Wearable electronic devices and		-	Identical under single
	63203-201-2):2022	technologies Part 201-2: Electronic			numbering
	IEC 63203-201-2:	textile Section 2: Measurement			
	2022	methods for basic properties of			
	IEC 63203-201-2:	conductive fabrics and insulation			
	2022	materials			
4	IS/IEC	Wearable electronic devices and		-	Identical under single
	63203-201-3):2021	technologies Part 201 Electronic			numbering
	IEC 63203-201-3:	textile Section 3:Determination of			
	2021	electrical resistance of conductive			
	IEC 63203-201-3:	textiles under simulated			
	2021	microclimate			
5	IS/IEC	Wearable electronic devices and		-	Identical under single
	63203-204-1):2023	technologies Part 204 Electronic			numbering
	IEC 63203-204-1:	textile Section 1: Test method for			
	2023	assessing washing durability of E-			
	IEC 63203-204-1:	textile products			
	2023				
6	IS/IEC/TR	Wearable electronic devices and		-	Identical under single
	63203-250-1):2021	technologies Part 250 Electronic			numbering
	IEC TR	textile Section 1: Snap fastener			
	63203-250-1:2021	connectors between e-textiles and			
l					

63203-402-1):2022 technologies Part 402 : Performance measurement of fitness wearables Section 1: Test methods of glove-type motion sensors for measuring finger movements		1			,	
Total Tota		_	detachable electronic devices			
63203-401-1):2023 technologies Part 401: Devices and systems: functional elements Section 1: Evaluation method of the stretchable resistive strain sensor						
IEC 63203-401-1:2023 Section 1: Evaluation method of the stretchable resistive strain Section 1: Evaluation method of the stretchable resistive strain Section 1: Evaluation method of the stretchable resistive strain Sensor Identical under single numbering numberin	7				-	_
63203-401-1:2023 Section 1: Evaluation method of the stretchable resistive strain sensor						numbering
TEC Season Seas						
63203-401-1:2023 sensor		63203-401-1:2023 Section 1: Evaluation method of				
Solution		_	the stretchable resistive strain			
63203-402-1):2022 technologies Part 402 : Performance measurement of fitness wearables Section 1: Test methods of glove-type motion sensors for measuring finger movements			sensor			
IEC 63203-402-1:2022 IEC methods of glove-type motion sensors for measuring finger movements	8		Wearable electronic devices and		-	Identical under single
63203-402-1:2022 fitness wearables Section 1: Test methods of glove-type motion sensors for measuring finger movements		63203-402-1):2022	technologies Part 402 :			numbering
IEC methods of glove-type motion sensors for measuring finger movements 9 IS/IEC Wearable electronic devices and technologies Part 406: Test method for measuring surface temperature of wrist- Section 1: worn wearable electronic devices while in contact 63203-406-1:2021 with human skin 10 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical IEC 63203-801-1:2022 IEC 63203-801-1:2022 IEC 63203-801-2:2022 IEC 63203-801-2:2022 IEC G3203-801-2:2022 IEC Low complexity medium access		IEC	Performance measurement of			
63203-402-1:2022 sensors for measuring finger movements 9 IS/IEC Wearable electronic devices and technologies Part 406: Test method for measuring surface temperature of wrist- Section 1: worn wearable electronic devices while in contact 63203-406-1:2021 with human skin 10 IS/IEC 63203-801-1:2022 technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical IEC 63203-801-1:2022 technologies Part 801: Smart body area network SmartBAN Section 2: Low complexity medium access 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2: Low complexity medium access		63203-402-1:2022	fitness wearables Section 1: Test			
movements 9 IS/IEC Wearable electronic devices and 63203-406-1):2021 technologies Part 406: Test method for measuring surface temperature of wrist- Section 1: worn wearable electronic devices while in contact 63203-406-1:2021 with human skin 10 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2: Enhanced ultra-low power physical layer 12 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2: Low complexity medium access		IEC	methods of glove-type motion			
9 IS/IEC Wearable electronic devices and technologies Part 406: Test method for measuring surface temperature of wrist- Section 1: worn wearable electronic devices while in contact with human skin 10 IS/IEC G3203-406-1:2021 Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer IEC G3203-801-1:2022 IEC G3203-801-2:2022 IEC G3203-801-2:2022 IEC G3203-801-2:2022 IEC G3203-801-2:2022 IEC G3203-801-2:2022 IEC G3203-801-2:2022 Low complexity medium access Lidentical under single numbering Identical under		63203-402-1:2022	sensors for measuring finger			
63203-406-1):2021 technologies Part 406: Test method for measuring surface temperature of wrist- Section 1: worn wearable electronic devices while in contact with human skin 10 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2: Low complexity medium access			movements			
IEC 63203-406-1:2021 of wrist- Section 1: worn wearable electronic devices while in contact with human skin 10 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC 63203-801-1:2022 Enhanced ultra-low power physical layer 12 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 13 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2: Low complexity medium access	9	IS/IEC	Wearable electronic devices and		-	Identical under single
63203-406-1:2021 of wrist- Section 1: worn wearable electronic devices while in contact with human skin 10 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2: Low complexity medium access		63203-406-1):2021	technologies Part 406: Test method			numbering
IEC electronic devices while in contact with human skin 10 IS/IEC Wearable electronic devices and 63203-801-1):2022 technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and effect of a section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and etchnologies Part 801: Smart body area network SmartBAN Section 2: Echnologies Part 801: Smart body area network SmartBAN Section 2: Low complexity medium access		IEC				
63203-406-1:2021 with human skin						
IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer IS/IEC S3203-801-1:2022 Enhanced ultra-low power physical layer IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2:		IEC	electronic devices while in contact			
63203-801-1):2022 technologies Part 801: Smart body area network SmartBAN Section 1: Enhanced ultra-low power physical layer 11 IS/IEC Wearable electronic devices and 63203-801-2):2022 technologies Part 801: Smart body area network SmartBAN Section 2: 63203-801-2:2022 Low complexity medium access		63203-406-1:2021	with human skin			
IEC area network SmartBAN Section 1: 63203-801-1:2022 Enhanced ultra-low power physical layer 63203-801-1:2022 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2: 63203-801-2:2022 Low complexity medium access	10	IS/IEC	Wearable electronic devices and		-	Identical under single
63203-801-1:2022 Enhanced ultra-low power physical layer 63203-801-1:2022 11 IS/IEC Wearable electronic devices and technologies Part 801: Smart body area network SmartBAN Section 2: 63203-801-2:2022 Low complexity medium access		63203-801-1):2022	technologies Part 801: Smart body			numbering
IEC layer 63203-801-1:2022 11 IS/IEC Wearable electronic devices and 63203-801-2):2022 technologies Part 801: Smart body area network SmartBAN Section 2: 63203-801-2:2022 Low complexity medium access		IEC	area network SmartBAN Section 1:			
63203-801-1:2022 11 IS/IEC Wearable electronic devices and 63203-801-2):2022 technologies Part 801: Smart body area network SmartBAN Section 2: 63203-801-2:2022 Low complexity medium access		63203-801-1:2022	Enhanced ultra-low power physical			
11 IS/IEC Wearable electronic devices and 63203-801-2):2022 technologies Part 801: Smart body area network SmartBAN Section 2: 63203-801-2:2022 Low complexity medium access		IEC	layer			
63203-801-2):2022 technologies Part 801: Smart body IEC area network SmartBAN Section 2: 63203-801-2:2022 Low complexity medium access		63203-801-1:2022				
IEC area network SmartBAN Section 2: 63203-801-2:2022 Low complexity medium access	11	IS/IEC	Wearable electronic devices and		-	Identical under single
63203-801-2:2022 Low complexity medium access		63203-801-2):2022	technologies Part 801: Smart body			numbering
		IEC	area network SmartBAN Section 2:			
IEC control MAC for SmartBAN		63203-801-2:2022	Low complexity medium access			
120 Control in to for Simulating		IEC	control MAC for SmartBAN			
63203-801-2:2022		63203-801-2:2022				

Standards under Development

Projects Approved				
SI. No.	SI. No. Doc No. Title			
No Records Found				

Preliminary Draft Standards				
SI. No.	SI. No. Doc No. Title			
No Records Found				

Drafts Standards in WC Stage				
SI. No.	Doc No.	Title		
No Records Found				

Draft Standards Completed WC Stage				
SI. No.	Doc No.	Title		
No Records Found				

Finalized Draft Indian Standard

SI. No.	Doc No.	Title
1	LITD 33 (27090)	Writable Functional Inks for Pens Conductive and Resistive

Finalized Draft Indian Standards under Print				
SI. No.	SI. No. Doc No. Title			
No Records Found				

Total Published Standards:0 Total Standards Under development:1

Aspect Wise Report

Product: 0
Code of Practices: 0
Methods of Test: 0
Terminology: 0
Dimensions: 0
System Standard: 0
Safety Standard: 0
Others: 11

Service Specification: 0 Process Specification: 0 Unclassified: 0

Annexure-I :List of Indian Standards Withdrawn/Superseded

SI. No.	IS No. & Year	Title		
No Records Found				

Annexure-II : List of Indian Product Standards

SI. No.	IS No. & Year	Title	
No Records Found			