

S. No.	Project No	Domain	Project name	Total funding from 2016-17 to 2018-19 (in lakhs)	Institutes
1	5682	Water Resources & River Systems	An Integrated Autonomous UAV and WSN-based System for Crop Water Management and Crop Condition Monitoring	195.00	IIT Kharagpur
2	6974	Water Resources & River Systems	Smart water solutions in agriculture: Integration of Sensors, Satellite & ICT tools	338.08	IISc Bengaluru
3	7729	Nano-Technology Hardware	Nano-material based Humidity Sensors on CMOS Platform	184.80	IIT Kharagpur
4	5628	Nano-Technology Hardware	Multiband infra-red detection systems with hybrid nanodevices for applications pertaining to public safety and agriculture	399.70	IISc Bengaluru
5	6193	Nano-Technology Hardware	Development and Field Deployment of a low cost, disposable, qualitative nanosensor for gauging the quality of milk	99.52	IIT Hyderabad
6	5877	Energy	Methodology, instrumentation and technology transfer towards life estimation of structural steel components in fast breeder nuclear reactors	302.31	IIT Kharagpur
7	5425	Healthcare	Validation and improving the formulation of a century-old ayurvedic medicine against hepatitis B virus	99.54	IIT Delhi
8	6177	Healthcare	Manufacturing Solutions for the Preparation of Siddha Medicines (Traditional Medicines Originated from Tamilnadu)	115.97	IIT Guwahati
9	4244	Nano-Technology Hardware	To develop economically viable and scalable platform using continuous flow chemistry for the large scale production of nanomaterials and their applications	399.00	IIT Bombay
10	7986	Energy	Development of pressurized dual fluidized bed gasifier for high-ash Indian coal	400.00	IIT Kanpur
11	4573	Information & Communication Technology	Open Dataset Repository for aiding Heritage Preservation, Restoration and Management of Temple Architecture	387.87	IIT Kharagpur
12	4578	Information & Communication Technology	Demonstration of Mode Division Multiplexed communication system with Few Mode Fibers	251.20	IIT Madras
13	5283	Information & Communication Technology	Development of Speech Interface for Form-filling application in Five Indian languages	376.80	IIT Kharagpur
14	5326	Information & Communication Technology	Information Access from Document Images of Indian languages	400.00	IIT Kharagpur
15	5367	Information & Communication Technology	Construction of new cryptographic primitives from obfuscation	66.00	IIT Kharagpur
16	5382	Information & Communication Technology	Developing Advanced Parser and Search Engine for Sanskrit to deal with Poetic and unsegmented corpus	165.36	IIT Kharagpur

17	5496	Information & Communication Technology	FMSAFE: A Networked Centre for Formal Methods in Validation and Certification Procedures for Safety Critical ICT Systems	348.00	IIT Kharagpur
18	5592	Information & Communication Technology	A Platform for Crosslingual and Multilingual Event Monitoring in Indian Languages	392.83	IIT Kharagpur
19	5648	Information & Communication Technology	Embedded System Reliability Prediction Model	52.80	IIT Kharagpur
20	5825	Information & Communication Technology	Processing the language of social media for post-disaster situation analysis	98.31	IIT Kharagpur
21	5895	Information & Communication Technology	Electronically Tunable RF Filters	72.00	IIT Delhi
22	6067	Information & Communication Technology	Assistive Technologies for Motor and Cognitive Rehabilitation of Stroke Patients in India	289.97	IIT Kharagpur
23	6406	Information & Communication Technology	Development of anti-spoofing measure for speech interfaces to prevent computer generated voice hacking	48.20	IIT Kharagpur
24	6918	Information & Communication Technology	An Efficient Software Framework for developing Reliable Multi-threaded Applications for Multi-Core Architectures	60.81	IIT Hyderabad
25	7086	Information & Communication Technology	Analysis and archival of Carnatic Music: A computational approach	222.43	IIT Madras
26	7136	Information & Communication Technology	Telepresence Infrastructure for Cost-Effective Instructional Applications in Education	381.87	IIT Kharagpur
27	7188	Information & Communication Technology	Development of Scalable GaN-based Distributed Dynamic Power Management System for IoT Applications with On-Demand Dynamic Thermal Management	244.80	IIT Kharagpur
28	7382	Information & Communication Technology	Developing an integrated digital system for condition assessment, decay identification, preservation aid and monitoring of heritage structures through networking of experts	225.90	IIT Kharagpur
29	7482	Information & Communication Technology	Power Aware Compiler for Embedded Processors	40.46	IIT Allahabad
30	7515	Information & Communication Technology	Smart Classrooms: Technology Aids for Effective Teaching in Large Classrooms	60.00	IIT Bombay
31	7612	Information & Communication Technology	Design and Development of an Information Security Metrics Tool for Critical Sector Enterprises	315.26	Jadavpur University

32	6324	Nano-Technology Hardware	Training & Entrepreneurship Program in Nanotechnology	398.40	IISc Bengaluru
33	8044	Environmental Science & Climate Change	Techno-economic feasibility of converting black liquor into value added products along with soda ash recovery and zero discharge effluents generation	143.20	IIT Roorkee
34	4081	Information & Communication Technology	Through The Earth Two Way Voice Communication System For Underground Mines	118.25	IIT Bombay
35	4194	Security & Defence	Optical coatings for high-reflection and anti-reflection applications	212.03	IIT Kanpur
36	4269	Security & Defence	Design and Fabrication of a Firing Impulse Generator for Large Caliber Guns	356.10	IIT Kanpur
37	4277	Security & Defence	Automatically Crashing Multithreaded Programs	39.84	IISc Bengaluru
38	4302	Security & Defence	Distributed Collision Detection and Prediction Systems for Large Scale Autonomous Operations	142.80	IISc Bengaluru
39	4321	Security & Defence	Tactical and Strategic Autonomous Decision Making Aids for Low Intensity Conflict Management	120.00	IISc Bengaluru
40	4335	Advanced Materials	Development of a forged aircraft structural component of a new high strength deep hardenable beta Ti alloy, Ti-5Al-5Mo-5V-3Cr	385.00	IIT Kharagpur
41	4382	Security & Defence	3-dimensional forward-looking Imaging Sonar for Autonomous Underwater Vehicles	342.00	IIT Delhi
42	4413	Security & Defence	Fast Design Centric Electromagnetic Solver for Stealth Applications	126.00	IISc Bengaluru
43	4572	Information & Communication Technology	Smart, Intelligent and Mobile Mines for Border Surveillance with Fault Tolerant Breach Detection Capabilities	201.00	IIT Kanpur
44	4576	Security & Defence	Trajectory Generation and Control of Autonomous Rotary Wing Unmanned Aerial Vehicles	274.80	IIT Kanpur
45	5214	Security & Defence	Development of Wireless Powered Sensor Nodes for Hostile Environments	216.00	IISc Bengaluru
46	5223	Nano-Technology Hardware	GaN HEMT based circuit design solutions and product demonstration for defense and space applications	197.00	IIT Kanpur
47	5274	Security & Defence	Blast Resistant Bunkers	145.15	IIT Kharagpur
48	5318	Security & Defence	Ultra high efficiency CMOS compatible Si/Ge Single Nanowire Photodetectors in Infrared and THz Wavelengths for Defence and Security Applications	268.56	IIT Kharagpur
49	5375	Security & Defence	Power Scalable kiloWatt Class Laser Sources for Directed Energy Applications Through Coherent Beam Combining of Narrow Linewidth Fiber Lasers	399.59	IIT Madras
50	5469	Security & Defence	Development of high energy and high power density lithium ion battery for under water application	160.61	IIT Kharagpur
51	5676	Security & Defence	Integrated RF, microwave and mm-wave radar-on-chip systems for security applications	398.40	IISc Bengaluru
52	5800	Manufacturing	Manufacturing of Compact Sensors for Force, Temperature, Vibration, Acoustic and Biosensor measurement Applications using Graphene Nanocomposites	399.99	IISc Bengaluru
53	5858	Security & Defence	Quick detection of trapped human victims buried under rubble	83.68	IIT Kharagpur
54	5890	Security & Defence	Multifunctional in situ gelling, self-administered paint-on wound dressing for in field trauma care	217.08	IIT Bombay
55	5892	Security & Defence	Scale-up of Diesel Autothermal Reformer from 5 kWe to 30 kWe for Naval Applications	186.07	IIT Gandhinagar
56	5959	Security & Defence	Experimentally validated numerical modelling of the damage induced due to aerodynamic shear and high temperature on the re-entry vehicle nosecone	263.13	IIT Delhi
57	5989	Security & Defence	Development of a User-friendly Semi-automated Quad-rotor for Navigation in Indoor Environments	300.00	IIT Madras
58	6216	Security & Defence	Analytical Modeling, Design, PIC simulation and Development of Gigawatt range of pulse HPM Oscillator -- Reltron	374.80	IIT (BHU) Varanasi
59	6439	Information & Communication Technology	Decentralized Target Tracking using Swarms of Aerial Robots	169.44	IIT Kharagpur
60	6452	Security & Defence	Shoulder Fired Surface to Air Missile Emulator System: Case of Igla Missile	128.66	IIT Jodhpur
61	6596	Manufacturing	Manufacture of shells for field guns with improved design and performance	190.00	IIT Kharagpur

62	6598	Security & Defence	Characterization of rock and fiber-reinforced concrete under impact loading and multi-axial stress state for blast resistant design	119.99	IIT Delhi
63	6750	Security & Defence	Synthesis of indigenous two dimensional and stereo PIV systems		
64	6921	Security & Defence	Tactical UAV Operations for Area Defence	399.87	IIT Kanpur
65	7058	Security & Defence	Smart Integrated Landmine Detection System (SILDS) based on explosive vapor-sensing nose, highly-sensitive magnetic field sensing, and microwave radar imaging	87.60	IISc Bengaluru
66	7139	Security & Defence	HYdrogen-Peroxide-Ethanol Rover (HYPER)	400.00	IIT Delhi
67	7146	Manufacturing	Indigenous fabrication of synchrotron X-ray mirrors	184.80	IIT Bombay
68	7485	Security & Defence	Free space optical link for line of sight communication near border areas	389.19	IIT Madras
69	7685	Security & Defence	Development of Lead Free High Temperature Piezoelectric Materials for Actuators in Defence Applications	65.66	IIT Madras
70	7737	Security & Defence	Piezoelectric Energy Harvesting Solutions for Powering Defence Related Sensors in Combat Zones and Inaccessible Regions	204.38	IIT Bombay
71	7804	Security & Defence	Game-based Interactive Simulator for Training Professionals in Cybersecurity Vulnerabilities	361.04	IIT Delhi
72	7821	Security & Defence	Identification of covert Geo-locations in a scene, using a Hyper-Classifer based Intelligent Robotic Visual Perception system	195.60	IIT Delhi
73	7884	Security & Defence	Development of a back pack rocket motor for a soldier	187.00	IIT Madras
74	7975	Security & Defence	Indigenously Developed Spectroscopic Radiation Portal Monitors for National Security	398.42	IIT Madras
75	8035	Security & Defence	Fiber-optic guided wave Structural Health Integrity Evaluation and Diagnosis (SHIELD) for Defence Components	236.40	IIT Kanpur
76	8098	Information & Communication Technology	Indigenous Terahertz (THz) imaging system for security and industrial applications using a laser-plasma source	400.00	IIT Madras
77	4451	Advanced Materials	Nanoporous, antimicrobial membranes for water filtration derived through crystallization induced phase separation in PVDF/PMMA blends	160.65	IIT Madras
78	5419	Sustainable Habitat	Sustainable Solar Powered Wastewater Treatment Systems to Improve Hygiene and Sanitation in Schools by Adopting Water Recycling and Online Quality Monitoring.	326.40	IISc Bengaluru
79	5670	Sustainable Habitat	Small Scale and Sustainable Household Wastewater Recycling (S3HWR)	132.00	IIT Madras
80	5685	Sustainable Habitat	Hydrodynamic cavitation assisted advanced waste water treatment for micro-pollutant & Experimentation, Numerical analysis & scale up	242.10	IISc Bengaluru
81	5845	Water Resources & River Systems	A novel colorimetric biosensor for rapid on-site detection and online monitoring of faecal contamination in water	50.00	IIT Roorkee
82	6125	Sustainable Habitat	Solar Energy Assisted Multi-effect Distillation System to Produce Drinking Water in India from Contaminated Water	349.59	IISc Bengaluru
83	7310	Nano-Technology Hardware	Development of real-time water quality monitoring and purification systems using nano-structured materials	63.08	IIT Roorkee
84	4165	Information & Communication Technology	Development of P2P Learning Management System - Brihaspati4, and deploying it for Indian Academia	282.65	IIT Kharagpur
85	4402	Nano-Technology Hardware	Development of web enabled learning/training modules for nanomaterials, fabrication and devices	162.50	IIT Kanpur
86	4411	Manufacturing	Multi-Station Multi-Axis Hybrid Layered Manufacturing System	120.00	IIT Delhi
87	5360	Nano-Technology Hardware	High voltage & ESD device development & enablement for SCL 180nm CMOS Technology	400.00	IIT Bombay
88	5627	Manufacturing	Designing and fabrication of an aerodynamic lens for nanoparticles of variable size	298.30	IISc Bengaluru
89	5736	Advanced Materials	Fabrication of polymer based materials for thermoelectric applications	51.20	IIT Hyderabad
90	6099	Nano-Technology Hardware	Design of a Surface-Enhanced Spectroscopy based Device for the Rapid Detection of Organophosphate Pesticides and Pyrethroid Insecticides in Fruits and Vegetables	329.00	IIT Madras
				296.55	IISER - TVM

91	6292	Advanced Materials	Design and Development of Dynamic Mechanical Analyser	360.19	NIT Rourkela
92	6349	Nano-Technology Hardware	Reusable and Field-Deployable Nanobiocatalysts for Detection of Pesticides and Herbicides	56.40	IIT Gandhinagar
93	6367	Advanced Materials	Periodic foam materials for noise-reducing heat sinks		
94	6722	Manufacturing	Development of Technology and Machine for Controlled Spontaneous Manufacturing of Multi-scale Fractal Structures using Fluid Instabilities for Biomimetic and other Applications	144.08	IIT Bombay
95	6840	Environmental Science & Climate Change	Development of a smartphone camera-based sensor for detection and remediation of chromium pollution in water	395.39	IIT Bombay
96	7057	Nano-Technology Hardware	Development of Gallium-nitride HEMT Based Power Electronic Interfaces Enabled by Device-to-System Characterization and Modeling	88.40	IIT Kanpur
97	7127	Energy	Natural circulation loop coupled frost free refrigerator	390.00	IIT Bombay
98	7133	Manufacturing	Fabrication and evaluation of atomic force microscope probes with detachable and re-usable tips	76.32	NIT Warangal
99	7183	Advanced Materials	A Novel In Situ Mechanical-FTIR Setup for Combined Optical Imaging and IR Vibrational Spectroscopy	36.15	IISc Bengaluru
100	7210	Nano-Technology Hardware	Development of an Open Source Solidification/Melting Platform æ OpenSol	228.00	IIT Kharagpur
101	7464	Advanced Materials	Low-cost Additive Manufacturing Technique for Fabricating Through-Substrate Vias based three-dimensional micro-structures used in MEMS Applications	94.36	IIT Bombay
102	7510	Manufacturing	Electronically tuned ultra-wide band Microwave Monolithic Devices using Magnetic Nanostructures	396.96	IIT Kanpur
103	7519	Nano-Technology Hardware	Continuous discharge measurement in small open channels by using ultrasonic tomography	145.38	IIT Bombay
104	7535	Water Resources & River Systems	Metamaterial Enhanced Wireless Power Transmission System	400.00	IIT Delhi
105	7802	Advanced Materials	Indigenous low-cost compact optical non-contact device for in situ characterization of soft-matter.	115.70	IIT Kanpur
106	7967	Manufacturing	Development of an innovative process to fabricate ultra-fine grained bimetallic thin sheets for microforming applications.	64.44	IIT Guwahati
107	8144	Manufacturing	RISK ASSESSMENT OF MORAIN DAMMED GLACIER LAKES DUE TO CLIMATE CHANGE	118.44	IIT Madras
108	4096	Environmental Science & Climate Change	SmartWeather: Location based Deep weather event prediction using spatial big data computing	166.92	IIT Madras
109	6276	Information & Communication Technology	Ensuring food security in a changing climate: Mitigation and adaption strategies from the gene to the ecosystem level	341.40	IISc Bengaluru
110	4218	Environmental Science & Climate Change	Nutritional security through pollination security: pollination volatiles, pollution & climate change	246.41	IIT Patna
111	4367	Environmental Science & Climate Change	Marine Animal-inspired Smart Biodegradable Nanocomposites for Air-tight, Cold-Chain Free, Food Packaging	400.00	IISER Mohali
112	4538	Nano-Technology Hardware	Indigenous sensor technologies to monitor animal responses to climate change	399.00	IISc Bengaluru
113	5644	Environmental Science & Climate Change	Low-cost Handheld Systems for Soil Monitoring and Water Conservation in Indian Agriculture	96.08	IIT Bombay
114	5893	Nano-Technology Hardware	Prediction of Indian Summer Monsoon Rainfall through Evolution of Global Sea Surface Temperature	392.00	IISc Bengaluru
115	7570	Environmental Science & Climate Change	Design and Development of Bioresorbable Drug Eluting Coronary Stents	347.00	IIT Bombay
116	4129	Healthcare		74.40	IISc Bengaluru
				399.90	IIT Delhi

117	4192	Healthcare	Production of a crucial therapeutic protein for Trauma and Accident care in Escherichia Coli system	99.60	IIT Delhi
118	4204	Healthcare	ARTICULATE + : A system for automated assessment and rehabilitation of persons with articulation disorders	137.46	IIT Guwahati
119	4291	Advanced Materials	Affordable and cost effective cancer diagnosis/treatment using gold based biodegradable nanoparticles	399.80	IIT Hyderabad
120	4352	Healthcare	Aberrant circulating epigenomic signatures: Development and validation of non-invasive biomarkers for trans-generational monitoring of air pollution associated cancers	133.69	IIT Kharagpur
121	4404	Healthcare	Development, Evaluation & Scale-UP of non-invasive & low cost rapid TB diagnostics.	230.40	IIT Bombay
122	4429	Healthcare	Development of Smartphone Integrated Generic Microfluidic Devices for Rapid, Portable, and Affordable Point-of-Care Diagnostics	316.74	IIT Kharagpur
123	4511	Healthcare	Development of human embryo viability biomarker diagnostics for elective embryo transfer to improve pregnancy outcome: potential application in ART clinic	190.89	IISc Bengaluru
124	4550	Healthcare	Efficient Glycemic Control for the Management of Diabetes Complications : Intervention with Novel Point of Care Device for Community Healthcare	326.40	IISc Bengaluru
125	4560	Healthcare	Sodium Potassium Detection : Electro Finder	172.00	IIT Bombay
126	5163	Healthcare	In vivo testing and up-gradation of prototype optical probe for cervical and oral precancer detection	138.72	IIT Kanpur
127	5300	Advanced Materials	Development of new generation Acetabular Socket Linear and Femoral Head Prototypes with unique 3D microstructures and better fracture resistance for Osteoporosis and Osteoarthritis treatment	395.00	IISc Bengaluru
128	5334	Healthcare	Development of Artificial Pancreas for Closed Loop Blood Glucose Control of Type-1 Diabetic Patients in India	396.00	IISc Bengaluru
129	5344	Healthcare	Designer food formulation with resistant starch and protein for diabetic/nephro-diabetic patients: An approach towards commercialization	88.89	IIT Kharagpur
130	5350	Healthcare	Multilayered Skin Equivalent Model using Biopolymers for Burn Wound Management	164.10	IIT Kharagpur
131	5363	Advanced Materials	Multifunctional GO-Au PLGA as nanocomposite filler, contrast agent and for photothermal killing of resistive microbes in dental cavity	313.44	IIT Bombay
132	5400	Healthcare	Development of an affordable, automated and field deployable, point of care and contained system for rapid diagnosis of TB caused by Mycobacterium tuberculosis	230.40	IIT Delhi
133	5442	Manufacturing	Functionally Graded Bioactive Titanium Foam as Customized Cancellous Bone Analogue	248.11	IIT Kharagpur
134	5450	Advanced Materials	Development of macro-encapsulation device for islet cell transplantation for diabetes treatment	127.01	IIT Hyderabad
135	5576	Advanced Materials	Fabrication of microfluidic biomedical devices as laboratory-on-a-chip systems for blood filtering and detection of blood analytes using integrated biosensors for industrial healthcare applications	198.80	NIT Arunachal Pradesh
136	5653	Healthcare	Artificial skin (Bio-inspired bi-layer polymeric hybrid scaffold) for burn injuries and trauma care	270.06	IIT Delhi
137	5699	Nano-Technology Hardware	Minimally invasive Mobile Healthcare Diagnostic platform for Glycated Hemoglobin Detection	97.80	IIT Hyderabad
138	5701	Nano-Technology Hardware	Linear and non-linear colorimetric imaging sensors and instrumentation for bio-sensing	105.00	IIT Madras
139	5808	Advanced Materials	Nanoformulation-Cell penetrating peptide mediated delivery of Riboflavin to ocular cells	90.00	IIT Delhi
140	5866	Healthcare	Microfluidic based rapid point-of-care lab-on-chip diagnostic platform for early detection of cardiac arrest	199.91	IIT Bombay
141	5876	Advanced Materials	Maxillofacial and Periodontal Repair in Human Using 3-D Scaffold Matrices: Clinical Trial for Periodontal Ridge Augmentation	197.16	IIT Bombay
142	5881	Advanced Materials	Development of zirconia blocks for high quality, durable, affordable dental crowns	203.00	IIT Bombay
143	5917	Healthcare	A device for detecting circulating tumor cells in blood using a microfluidic chip and a fibre optic sensor	246.60	IIT Bombay
144	5968	Healthcare	Development of a portable decision support tool for screening high risk antenatal cases at household level by community health workers	103.90	IIT Kharagpur
145	6000	Healthcare	A Low-Cost, Portable, Super-Resolution Ultrasound Scanner	81.96	IISc Bengaluru
146	6013	Healthcare	An Automated and Efficient Glaucoma Prescreening System	81.96	IISc Bengaluru

147	6060	Healthcare	A microfluidic based point of care testing device for measuring urine albumin using a novel organic dye	73.20	IIT Mandi
148	6072	Healthcare	High end-light weight-inexpensive-passive rib-modeled injection mouldable polycentric prosthetic knee joint with deep squat feature	197.49	IIT Guwahati
149	6087	Information & Communication Technology	Development of a Suite of Indigenous Assistive Systems and Tools for the Disabled Community in India	398.00	IIT Kharagpur
150	6183	Healthcare	Microfluidic platform for continuous monitoring of gasotransmitters for early level management of Systemic Inflammatory Response Syndrome (SIRS) in Trauma patients	400.00	IIT Madras
151	6264	Healthcare	Development of Microneedle Array for Paediatric Applications	399.94	IISc Bengaluru
152	6391	Information & Communication Technology	Speech Based Patient Assistance System	276.00	IIT Bombay
153	6408	Nano-Technology Hardware	Advanced nanotracers for product life cycle assessment and product monitoring		
154	6519	Healthcare	On the role of ultrasound contrast agents in detecting early stages of atherosclerosis	157.42	IIT Gandhinagar
155	6537	Healthcare	Development of a remote healthcare delivery system: Early diagnosis, therapy, follow-up and preventive care for non-communicable diseases (cardio-pulmonary)	170.00	IIT Madras
156	6695	Healthcare	Development of SERS based ultra-sensitive, rapid, portable and field deployable platform for detection of pathogenic bacteria and Dengue virus	247.86	IIT Kharagpur
157	6714	Healthcare	Haemostatic bandages for trauma care	122.16	IIT Delhi
158	6803	Healthcare	Development, commercialization and deployment of complete mobility solution (indoor & outdoor) for people with locomotor disability	112.61	IIT Kanpur
159	6849	Healthcare	Development of Advanced Holter Monitor with extended recording and episode detection	185.74	IIT Madras
160	6851	Nano-Technology Hardware	Wearable drug delivery device based on microneedles for efficient management of Chemotherapy Induced Nausea and Vomiting (CINV)	95.60	IIT Kharagpur
161	6886	Healthcare	Development of accurate and field accessible methods of molecular diagnosis for detection of Infectious diseases in livestock population.	355.20	IIT Bombay
162	6919	Information & Communication Technology	A web and mobile phone based service for health administrators, medical officers and health workers to track/monitor progress of Tuberculosis (TB) patients in real-time	382.80	IISc Bengaluru
163	6942	Information & Communication Technology	A Mobile-based Virtual Reality Platform for Training and Educating Community Health Workers (CHWs)	40.87	IIT Guwahati
164	6966	Healthcare	A Smartphone-Based Dark-Field Microscope for Point of Care (POC) Diagnosis of Blood-Cell Disorders in Lethal Diseases	44.96	IIT Guwahati
165	6999	Healthcare	Development of an inexpensive obstructive sleep apnea (OSA) detection and analysis system useful for home care	121.06	IIT Kanpur
166	7075	Healthcare	Instrument-free Point-of-care Device for Detection of Pathogens and Antimicrobial resistance	68.40	IIT Kharagpur
167	7211	Advanced Materials	Light based ultrasound array detector development for diagnosing RBC under various disease model in infant	149.97	IIT Bombay
168	7419	Healthcare	Design and Fabrication of Composite Scaffolds for Skeletal Injuries from Biological Waste Materials	143.00	IIT Hyderabad
169	7521	Nano-Technology Hardware	Nanotechnology-enabled non-invasive health monitoring platforms suitable for widescale deployment	164.10	IIT Kharagpur
170	7533	Healthcare	Development of clinical grade tissue grafts for the treatment of bone and cartilage tissue defects and diseases	200.40	IIT Bombay
171	7661	Healthcare	Development of a low-cost on-chip PCR (polymerase chain reaction) platform for rapid nucleic acid based disease diagnosis	396.72	NIT Rourkela
				198.99	IIT Hyderabad

172	7781	Healthcare	Development of a Cost Effective Left Ventricular Assist Device (LVAD) with Centrifugal Mechanical Circulator, Drive System and Associated Control	304.00	IIT Kharagpur
173	7814	Healthcare	Development of indigenous detection tool for Entamoeba histolytica from stool sample	243.60	IIT Kharagpur
174	8058	Healthcare	Extreme Point of Care Diagnostics on a CD	378.81	IIT Kharagpur
175	8087	Information & Communication Technology	Large scale public health monitoring using point-of-use devices for urinalysis	225.60	IISc Bengaluru
176	8123	Healthcare	Development of probiotic/prebiotic based nutraceutical/fortified food product for enhancing health and immunity of malnourished children and cancer patients undergoing chemotherapy	380.52	IIT Kharagpur
177	8129	Information & Communication Technology	Development of a system for post stroke rehabilitation of hand functions using a low cost robotic exoskeleton	305.58	IIT Kharagpur
178	4354	Manufacturing	Automated Fiber Placement (AFP) Machines for automated fabrication of fiber reinforced composite products	98.40	IIT Madras
179	5298	Advanced Materials	Developing Indigenous Lightweight Components for Automobile Powertrains	389.74	IIT Kanpur
180	5506	Manufacturing	Development of Adaptive Double Sided Incremental Forming Process for Dieless Manufacturing	247.72	IIITDM Jabalpur
181	5509	Manufacturing	Structure integrated sensors and actuators to monitor and renew machine tool performance	202.80	IIT Kanpur
182	5868	Manufacturing	LAND BASED TURBINE COMPONENTS WITH ADDITIVE MANUFACTURING IN A CONSORTIUM APPROACH	397.50	IISc Bengaluru
183	6362	Energy	Next Generation Heat Exchangers Design Using Additive Manufacturing and Shape Optimization	342.00	IIT Madras
184	6466	Advanced Materials	Erosion, Corrosion and Deposition Resistant Coatings for Coal-Fired Boilers	96.00	IIT Ropar
185	6917	Manufacturing	Indigenous development of online process monitoring of laser surface hardening, cladding and additive manufacturing and studies on dynamic mechanical behavior of manufactured parts	396.00	IIT Kharagpur
186	7035	Advanced Materials	Hierarchical nanostructured carbon materials derived from candle soot and graphene for high rate and high performance electrodes for automotive batteries and supercapacitors	260.68	IIT Hyderabad
187	7052	Advanced Materials	Development of a thermodynamic database for titanium alloys assisted by experiments and ab initio calculations	283.20	IIT Madras
188	7574	Advanced Materials	Scaled up fabrication of ceramic foam based high temperature insulation for laboratory and industrial kilns	101.00	IIT Bombay
189	7945	Advanced Materials	Development of Life Prediction methodologies for DS Nickel based superalloys for gas-turbine application	97.56	IIT Bombay
190	7330	Advanced Materials	Development of Cost Effective Magneto-Rheological (MR) Fluid Damper in Two wheelers and Four Wheelers Automobile to Improve Ride Comfort and Stability	355.00	NITK Surathkal
191	7338	Information & Communication Technology	A simple and robust non-contact method for rapid structural health monitoring of critical infrastructure using Digital Image Correlation.	38.50	NIT Warangal
192	7772	Advanced Materials	A multi-scale framework for designing green tyres	129.73	IIT Madras
193	7911	Energy	Hybrid Sodium-ion cell /super-capacitor packs for Light Electric Vehicles	318.58	IIT Kharagpur
194	7711	Sustainable Habitat	Development of Pre-packaged, High Performance Grout (HPG) using Locally Available Cementitious Materials for the Indian Post-Tensioned (PT) Concrete Industry	36.36	IIT Madras
195	4045	Advanced Materials	Development of ZrB2-SiC Based Materials for Nose-Cone Leading Edge in Re-entry Space Vehicles	246.24	IIT Kanpur
196	5404	Advanced Materials	Development of high strength ceramic magnet for rotating machine applications	37.28	IIT (BHU) Varanasi
197	6456	Advanced Materials	Indigenous development of a ultra high strength steel with stainless property for space application	317.00	IIT Kharagpur

198	7191	Advanced Materials	A new class of high temperature high strength copper based alloys for space and other critical applications	324.96	IISc Bengaluru
199	7248	Information & Communication Technology	A novel radio telescope using ultra-low-noise receiver arrays	350.00	RRI
200	7352	Information & Communication Technology	Asynchronous Optical Scanning based THz time-domain spectroscopy for delamination study of space shuttle materials	226.25	IIT Kharagpur
201	7969	Advanced Materials	Self Healing Circuits for Automatic Repair of Open Faults: Increasing Reliability of Electronic Devices for Space and Defence Applications	34.58	IISc Bengaluru
202	5288	Manufacturing	Wear resistance and finishability of plasma transferred arc assisted cermet deposits used in fabrication of long-life ground contact parts in excavators.	304.25	IIT Kharagpur
203	4077	Energy	Nanoparticle Dispersed Deep Eutectic Solvents as Low Cost Heat Transfer fluid for Concentrated Solar Thermal Power Plant	60.96	IIT Guwahati
204	4337	Energy	A Cost-effective Low-loss Converter Topology for Solar power Integration with the Grid Complying Grid Codes	147.00	IIT Kharagpur
205	4424	Energy	Hybrid: Latent and Sensible heat thermal storage system for medium and high temperature CSP applications	399.28	IISc Bengaluru
206	4472	Energy	Solar Powered Tunable Smart Windows by Electro-Thermal Coating of Near Infrared Plasmonic Metal Oxide Nanocrystal towards Energy Saving Applications	334.00	IISER Pune
207	5296	Energy	Development of 10 kW/50 kWh Redox Flow Battery System for Solar PV Applications	399.84	IIT Madras
208	5441	Advanced Materials	Fabrication of Si-ZnO-ZnMgO heterojunction solar cell through improved ZnO-ZnMgO hexagonal nanopillar	65.05	NIT Arunachal Pradesh
209	5815	Energy	Design, development and demonstration of indigenous hydrogen storage and fuel cell system for mobile and stationary applications of 5 kW capacity	399.99	IIT Bombay
210	5931	Energy	Development of Polymer Electrolyte Fuel Cell Stack with Self Humidification	397.80	IIT Bombay
211	6150	Energy	Development of indigenous X-band marine radar and its application in real-time mapping of renewable energy from oceans	386.09	IIT Bombay
212	6472	Energy	Solar Roaster	152.50	IIT Bombay
213	7698	Energy	Mass Cultivation of Microalgae for the Production of High Value Bio-Fuel Fractions through Hydro-Thermal Liquefaction (HTL)	237.00	IIT Guwahati
214	5294	Energy	Unlocking shale gas potential in India through a reservoir geomechanical approach	192.00	IIT Bombay
215	6727	Energy	Design and development of energy efficient and environment friendly LPG and Kerosene cooking stoves with Porous Radiant Burners for household and large-scale cooking applications	159.79	IIT Guwahati
216	5993	Manufacturing	Development of 3D printed nanofiber-based bioreactor for in vitro drug testing	132.38	IIT Hyderabad
217	4035	Advanced Materials	Development and application of small scale bending tests for residual property assessment of high temperature materials in turbines	221.52	IISc Bengaluru
218	4548	Energy	Design, Development and Control of High-Speed Switched Reluctance Generator for Direct-Coupled Operation with Thermal Turbo-Machinery	395.00	IISc Bengaluru
219	4562	Energy	Design and Development of High Efficient Switched Reluctance Motor based Solar Photovoltaic (SPV) Water Pumping System (WPS)	95.14	NIT Warangal
220	4569	Energy	Development and Evaluation of an in-situ high-temperature guided ultrasonic wave based corrosion-under-insulation detection system for nuclear power plant pipes (nGUMPS)	394.00	IIT Madras
221	5225	Advanced Materials	Indigenous low cost polymer electrolyte membrane (PEM) fuel cell of 1.0 kW: Running of home appliances/electric rickshaw in IIT Kanpur campus	370.00	IIT Kanpur
222	5481	Energy	Pilot-Scale Production of Green Diesel from Isolated High-Yielding Microalgae Strains: Process Optimization and Engine Performance	324.01	IIT Hyderabad
223	6042	Energy	Decentralized power generation using micro gas turbines	398.96	IIT Kanpur
224	6147	Energy	Slagging and fouling due to fly-ash, and additives for their mitigation in coal-fired boilers	120.00	IIT Madras

225	6158	Information & Communication Technology	A Software Tool for the Planning and Design of Smart Micro Power Grids	202.92	IIT Guwahati
226	6773	Energy	Data-driven modeling, analytics, and optimization techniques to manage building thermal demand		
227	7055	Energy	Power Converter Design and Implementations for Energy Efficient Applications using Wide-Bandgap Power Devices	202.00	IIT Bombay
228	7093	Energy	Fuel-Flexible Colorless Combustor for Ultra-Micro (1-10 kW) Gas Turbine Systems	184.38	IIT Kanpur
229	7190	Sustainable Habitat	Solar Grain Dryer	120.00	IIT Kanpur
230	7738	Energy	Development of a smart measuring system for the estimation of void fraction in gas-liquid two phase flow	144.00	IIT Bombay
231	7863	Energy	deploying multisensor detection and signal fusion	196.00	IIT Kharagpur
232	8073	Energy	Cognition and Control for Demand Management: Sensors, Actuators and Web Services for Smart Consumers	140.04	IIT Bombay
233	6777	Energy	Low Cost Indoor Occupancy and Climate Monitoring System For Energy Conservation	88.75	IIT Kanpur
234	4551	Advanced Materials	High strength, wear and corrosion resistant steel for high speed rail and elastic clip	396.00	IIT Kanpur
235	5444	Environmental Science & Climate Change	Development of a Waste to Wealth Green Biochar Production Unit for Implementation as Soil Nutrient Source in the Rural Areas of West Bengal and Bihar	180.00	IIT Kharagpur
236	4468	Sustainable Habitat	Cost Effective Cyclone Resistant Sustainable Rural Housing Technology using Cold-formed Steel	349.00	IIT Hyderabad
237	4469	Advanced Materials	Development of TRIP (transformation induced plasticity) assisted ultrahigh strength duplex steels by warm-rolling.	78.78	IIT Hyderabad
238	4575	Advanced Materials	indigenous software development for ICME: Focus on the meso-scope length scale	319.44	IISc Bengaluru
239	5222	Advanced Materials	Development of nano-structured ultra high strength steel with good ductility	399.78	IIT Roorkee
240	6209	Water Resources & River Systems	New generation MgO-C refractories with improved oxidation resistance and hot strength for ferrous metallurgy	112.80	NIT Rourkela
241	7365	Advanced Materials	Reclamation of Steel Industry Wastewater through Phycoremediation Technique Using Microalgae and Assessment of Biofuel Production from Algal Biomass	45.12	NIT Durgapur
242	7742	Advanced Materials	Microwave assisted reduction of iron ore/slimes: An innovative and cost effective approach for steel production	331.80	IIT Madras
243	8014	Advanced Materials	High strength steel sheets and wires production by Thermo-Mechano-Surface-Chemical Treatment	96.00	IIT Roorkee
244	4380	Information & Communication Technology	Model based optimization tool (EAF_OPT) for enhancing Energy Efficiency, Productivity and Yield of Electric Arc Furnaces	391.92	IIT Kanpur
245	6134	Environmental Science & Climate Change	Air Interface design for Ultra dense network scenario in 5G	399.00	IIT Kharagpur
246	4583	Sustainable Habitat	Hierarchically Structured Micro-Nano Pore Nanocomposite Membrane made of Ferric-Oxide Decorated-Titania-Activated-Carbon-Flyash in Carbonized Epoxy Resin as Versatile Filters for Water Purifications: Removal of Organic-Dyes-Heavy-Metals-Microbial-Pathogens	250.00	IIT Kanpur
247	5370	Sustainable Habitat	PROPAGATION AND MITIGATION MODEL OF MIXED ROAD TRAFFIC NOISE FOR PLANNING OF MID-SIZED INDIAN CITIES	373.53	IIT (BHU) Varanasi
248	5459	Energy	Transformative Design Processes for integrating Traditional Habitat and Smart Infrastructure Systems: Case of Peri-urban areas in Varanasi, Bhubaneswar and Vishakhapatnam, INDIA	140.28	IIT Kharagpur
249	5786	Water Resources & River Systems	Variable composition Bio-CNG based stationary power generating engine platform: In-cylinder and full cycle response characterization and prototype development	207.00	IISc Bengaluru
250	6003	Energy	Intelligent Water Supply Network Monitoring and Control for Equitable Distribution of WATER within a Mega city (EQWATER)	400.00	IISc Bengaluru
			Development of a Combustion System for Energy Recovery from Municipal Solid Waste Derived Fuel	399.90	IIT Bombay

251	6720	Information & Communication Technology	CityProbe: A city-scale pervasive sensing system for monitoring road conditions, air and sound pollution	239.55	IIT Bombay
252	6843	Water Resources & River Systems	Ultrasonic domestic water meter- product design and field testing	399.97	IIT Bombay
253	7094	Sustainable Habitat	Measures for Improving the Attractiveness of Pedestrian Facility Accessing Urban Local Bus Stops	72.00	IIT Bhubaneswar
254	7293	Sustainable Habitat	Action-research methods for urban improvement and slum upgrading: Transferring laboratory research into participatory live-work strategies in Mumbai and Delhi	125.38	IIT Roorkee
255	7794	Information & Communication Technology	Intelligent Surveillance Data Retriever (ISDR) for Smart city Applications	386.31	NIT Rourkela
256	7801	Energy	Sustainable waste water treatment through bio-photoelectro catalysis and biofuel production	384.34	IIT Mandi
257	4222	Water Resources & River Systems	Discharge estimation using non-contact hydrometric measurements	244.00	IIT Roorkee
258	4452	Environmental Science & Climate Change	Developing an Advanced Electrocoagulation System for Industrial Wastewater Treatment	63.75	IIT Hyderabad
259	5423	Water Resources & River Systems	Integrating UAV Technology with community-based tools for Monitoring Water Quality of the Ganga River	326.57	IIT Kanpur
Total funding				59589.01	