

ANNUAL REPORT 2020-21



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ABOUT US

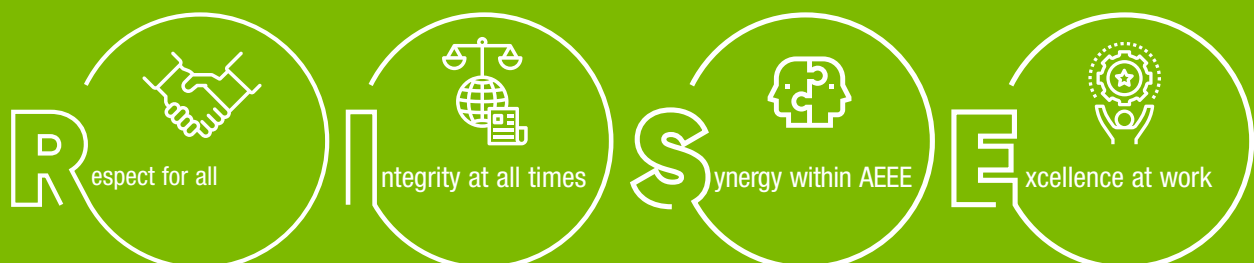
WHO WE ARE

Alliance for an Energy Efficient Economy (AEEE) is a leading not-for-profit organisation in India that creates awareness about Energy Efficiency (EE) as a resource. We promote data-driven and evidence-based EE policies and research as an energy efficiency market enabler. With a vision to foster a culture of energy efficiency in India, we work with the government, industry and civil society organisations to accelerate the country's energy transition to a climate-resilient, energy-secure future. At AEEE, we undertake cutting-edge, research-based projects for global bilateral, multilateral foundations and government agencies specialising in Sustainable Cold Chains, Advanced Technologies, Sustainable Building Designs, State and Local Action, Power Utility and eMobility, Energy Data Services and Sustainable Aviation.

AEEE follows a 'Lean-Mean-Green' philosophy to design and construct net-zero energy-water-waste built environments, sustainable transportation and a robust energy data framework for better policymaking and implementation. We take pride in our commitment to aiding India in meeting its commitments to 2030 Nationally Determined Contributions (NDCs) and the United Nations (UN) Sustainable Development Goals (SDGs).

OUR CORE VALUES

Our values are rooted in principles of human rights and equity, inspired by our vision of a sustainable, energy efficient future.



OUR VISION

To be a leader in responsible use of energy to transition to a climate resilient and energy secure future

OUR MISSION

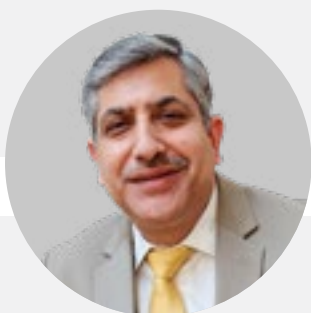
Foster a culture of energy efficiency in India



Enable energy transition in collaboration and cooperation with the government, industry, and civil society organisations



Accelerate impact as a policy enabler through thought leadership and research to meet India's 2030 Nationally Determined Contribution (NDCS) and United Nations' Sustainable Development Goals (SDGs)



MESSAGE FROM THE CHAIRPERSON

Striving for Excellence through Multi-Sector Collaborations

It is with pleasure that we present to you the 2020-21 Annual Report for Alliance for an Energy Efficient Economy (AEEE) that covers achievements and outcomes of the past year.

The Alliance for an Energy Efficient Economy was established as an industry body to advance energy efficiency in India, over a decade ago. During this period, AEEE has managed to emerge at the forefront of shaping thought leadership across critical energy efficiency initiatives in India ranging from energy efficiency in the built environment, thermal comfort for all, smart mobility initiatives, state actions as also aspects related to progressing industrial energy efficiency.

Even as we continue to grapple with the adverse impacts of the ongoing pandemic, AEEE successfully managed to retain the momentum on its key initiatives though this past year. The report shares several salient aspects of the impact enabled on-ground by the AEEE team across its various focus areas. As a membership driven body, AEEE is uniquely placed in enabling core actions across corporate and public sector institutions.

AEEE's membership spans across large corporates, technology innovators, wide spectrum of educational and research institutions, as also varied energy end-users committed to energy efficiency. By bringing together key energy stakeholders in India, we have influenced effective and impactful policies for a robust energy ecosystem. In the recent years, AEEE has also launched several initiatives in partnership with several leading global donors, bilateral and multilateral agencies, and peer organizations solidifying AEEE as a credible and effective platform in the field of energy efficiency in India.

Combining our expertise and research capabilities to inform our campaigns and advocacy work to help enable country's emission reduction goals remains central to AEEE's philosophy. India has set for itself a target for reduction of emissions by 33-35% by 2030, below 2005 levels. In keeping with our mission of 'transitioning to a resilient and energy secure future', AEEE remains committed to playing a stellar role in India's transition to achieving these NDC targets.

In closing, I wish to record my deepest appreciation for all our partners, the secretariat team and most importantly, our membership at large for contributing to the progress and mission of AEEE. I am confident that this synergistic collaboration would continue to blossom and enable India's transition to clean energy.

Upendra Bhatt
Chairperson



MESSAGE FROM PRESIDENT AND EXECUTIVE DIRECTOR

Decade of action to fulfil 2030 promises

COVID-19 has impacted us all in unforeseeable ways. Acknowledging the physical, emotional, and mental challenges many of us are facing, I would like to thank my colleagues who have weathered this challenging time gracefully. I would also like to express my gratitude to our members, partners, funders, and supporters, for their contribution, guidance, and constant support towards the vision and mission of Alliance for an Energy Efficient Economy.

Revisiting the initial stages of the pandemic in India, we acted proactively and took necessary preventive measures to ensure our employees' safety. We introduced a work-from-home policy and accelerated our migration to Google Cloud. I am happy to report that not only did we adapt to this transition smoothly, but we were also able to innovate and strengthen our outreach efforts.

Through the year, AEEE, in collaboration with Cool Coalition, Kigali Cooling Efficiency Program (K-CEP), United Nations Economic and Social Commission for Asia and the Pacific (UNESCAP), and the National Cooling Action Plan (NCAP) Working Group, set out to developing a global NCAP development methodology to help national governments conduct holistic assessment of their countries' current and projected cooling demand and develop tailored NCAPs.

Additionally, we formed the India Cooling Coalition (ICC), an independent and robust entity to facilitate the India Cooling Action Plan (ICAP) through knowledge exchange, engagement, and collaboration. In continuation to ramping up the implementation of ICAP, we also initiated a multi-year project with GIZ on district cooling implementation in India to reduce cooling-related greenhouse gas emissions in the Indian building sector. Lastly, in the spirit of ICAP implementation, we concluded a study on cold chain energy efficiency in India, collaborating with The World Bank, to enhance energy efficiency in India's packhouses. The study recommends a multi-stakeholder approach to build on the efforts of ongoing initiatives by the Ministry of Agriculture and Farmers' Welfare (MoA&FW), Ministry of Food Processing Industries (MoFPI), and Ministry of Commerce and Industry (MoCI).

Additionally, we also strengthened our leadership team with two director-level hires and increased our team strength when hiring patterns showed a downward trend across the industry.

As for the coming year, we are thrilled and gearing up for some exciting projects, including the launch of Phase II of the Green Vehicle Rating (GVR), State Energy Efficiency Index 2020, and Solar Decathlon India, among others. I look forward to working and strengthening relationships with our existing members and forging new partnerships in the year ahead, in the spirit of the triple-sector leadership that has enabled AEEE to make a mark in India's energy outlook over the years. It is even more crucial, especially in the Decade of Action, to encourage and call on people to make Global Goals their own to deliver our 2030 promises. This is our time to eliminate our carbon legacy, and we shall do our best!

Satish Kumar
President and Executive Director



MESSAGE FROM TREASURER

Building with Resilience, One Day at a Time

Doing an annual report for 2020-21 during the COVID-19 crisis has surprisingly been enlightening. It has helped us take solace from the past and equipped us with a unique lens to evaluate our work.

Emerging out of dynamic challenges that the pandemic presented before us, 2020-21 has been a year of delivery at AEEE. It helped us realise our potential, enabling resilient operations through the year.

For this reason, on behalf of the entire AEEE family, I would like to express my sincere gratitude to our partners, and members for continuing to place their trust in us; it has enabled us to strive for and perform better. I would also like to highlight the contribution of AEEE employees through these trying times and thank them for their unwavering commitment, which has immensely helped AEEE advance in their journey towards an energy secure future in India.

When the pandemic hit India in 2020, our immediate priority at AEEE was the health and safety of our colleagues, that led us to transition our entire strength to remote working in a short span of time; our new ways of working involved incorporation of new technologies. We took pivotal steps to protect jobs and the long-term stability of our organisation.

Today, as we respond to and recover from the crisis, we deeply realise the importance of investing in our people.

Over the year at AEEE, we were able to sustain operations and balance performance across our businesses. While our pipeline of work has remained strong, we will continue to reel through the impact of the pandemic even through FY21, which is why we need your support and trust to keep us going.

I thank our members, partners, staff, and other stakeholders for sticking by our side through thick and thin. I hope we takeaway new energy from here and deliver the best for tomorrow. Hope you enjoy this read; do your share your feedback with us.

Venkat Garimella
Treasurer

COMBATING COVID-19 WITH RESILIENCE

The COVID-19 crisis brought about a massive shift in the way we have worked for decades. To mitigate the spread of the virus, organisations across the world had to adapt to digital, with teleconferences and webinars becoming the new norm.

Acknowledging this transition, our journey has been eventful since the past year. We introduced a robust work from home policy to ensure safety and wellbeing of our employees and rolled out guidelines for work operations. Our efforts to stay afloat during these trying times were built on the foundation of 'FAITH' - our employee behavioural framework, which served as a guiding roadmap for our staff.

F

FLEXIBILITY

TO CHANGE AS SITUATION UNFOLDS

A

AWARENESS & ALERTNESS

TO MAINTAIN CONSTANT VIGIL

I

INSPIRE

EVERYONE IN THE COMMUNITY WITH OUR EXEMPLARY BEHAVIOUR

T

THANKFUL

FOR WHAT WE HAVE & TO THOSE WHO FIGHT FOR US

H

HEALTH

IS ABOVE EVERYTHING ELSE – FOR YOU & EVERYONE AROUND YOU

We went all out with our efforts to be one step ahead of the pandemic, which is why we even took necessary preventive measures around and inside the office premises. Our efforts included:



As for the digital space, we made a conscious decision to migrate to Google Cloud in order to enhance flexibility and reduce cost of operations. Not only did we use video-conferencing options for work, we also ensured to e-gather every once in a week to break away from the monotony of being locked indoors.



As of today, we try to operate out-of-office at least twice a week, but do not encourage those to visit with any symptoms of cough and cold. Our work from home guidelines continue to apply as before and are monitored and reviewed on a monthly basis as per the current COVID-19 situation. A big thank you and congratulations to all our employees, especially the support staff, who have walked an extra mile to make this transition easy and smooth.

We are certain to come out of this difficult stronger and soon!

GENERATING IMPACT

2020-21 has been a challenging yet eventful year. While the COVID-19 pandemic crippled us all with its emotional, mental, and physical implications, at AEEE, we still managed to sail through these trying times.

Here's a snapshot of what we did in the past year:

1. India Cooling Coalition - Strengthening Implementation of the India Cooling Action Plan (ICAP)



AEEE worked towards positioning the India Cooling Coalition (ICC) as an independent and robust entity by launching their new website and a new brand identity, i.e., logo. We worked towards defining coalition goals and objectives through its charter and governance framework, while also developing an active community of knowledge exchange, engagement, and collaboration for facilitating implementation of the India Cooling Action Plan (ICAP).



2. Youth come forward to combat the climate crisis with Solar Decathlon India



We kickstarted the Solar Decathlon India competition for undergraduate and postgraduate student teams from Indian institutions to innovate and combat climate change by designing net-zero-energy, net-zero-water, net-zero-waste and climate resilient buildings. Student teams prepared affordable, industry-ready solutions for real projects with the help of online education and mentoring provided during the year.

In its inaugural year, the competition brought together students, academia, industry experts, and government agencies to work on some cutting-edge innovations, among others.

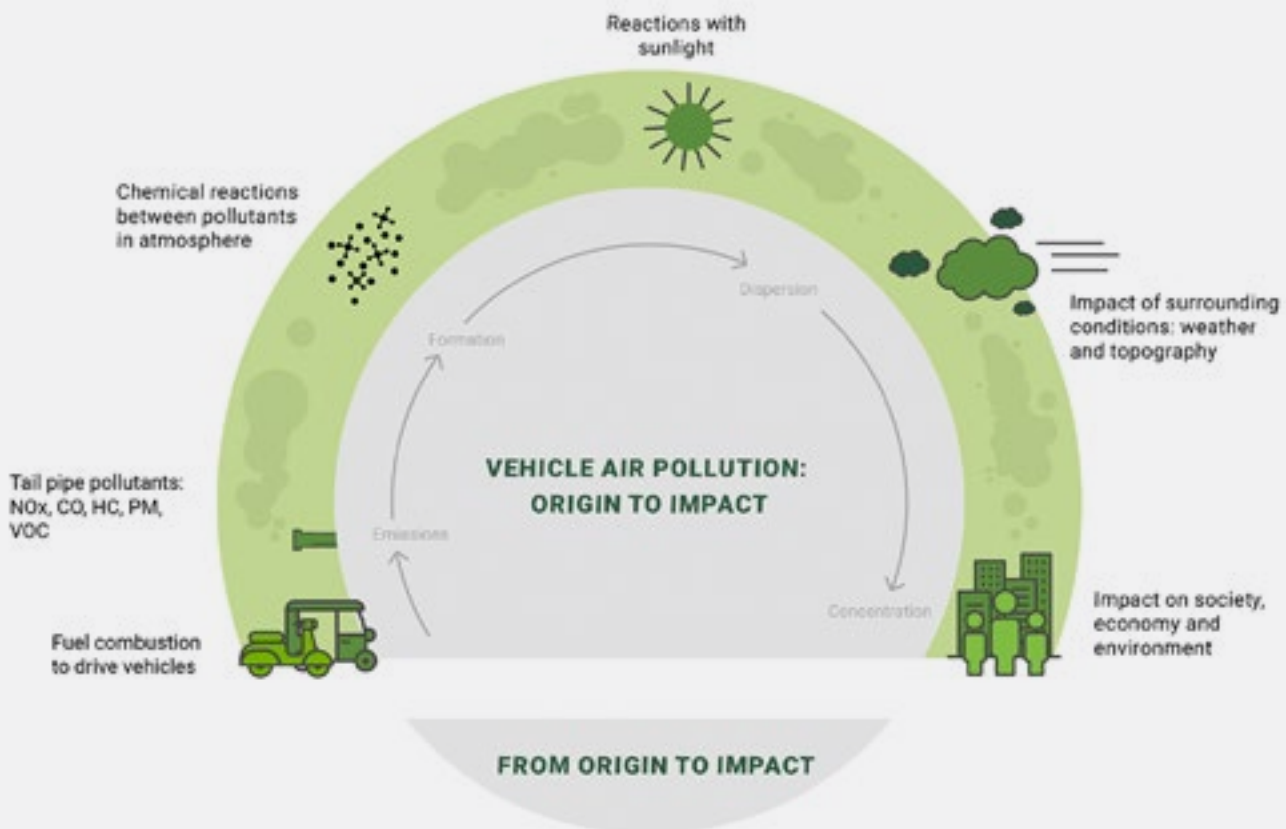


3. Leading the race towards a zero-emissions future



We launched Phase I of Green Vehicle Rating (GVR) to reshape consumer knowledge on the environmental performance of vehicles. This was done by identifying high to low performing vehicle models, in two and three-wheeler categories, in terms of the negative impacts of greenhouse gases and criteria pollutants released from tail pipes of top selling models. Along with a comparative analysis of models, the GVR also revealed external costs of energy-related pollution from vehicle exhausts - both GHGs and air pollutants. In 2020-21, GVR evaluated tail pipe emissions of twenty 2-wheeler models, and two 3-wheeler models. This pool included products from Bajaj, Hero Motors, TVS, Honda, Suzuki, and Eicher.

Green Vehicle Rating (GVR) for 2 and 3-wheelers envisions to create evidence-based awareness in consumers and shift their demand towards greener variants that rely on low emissions technology and high fuel economy. GVR allows consumers to identify the cleanest and most economically sensible vehicle models from an available pool, gives consumers web-based access to easy to understand information – in monetary terms – to inform their purchase decisions, and see the costs and benefits of owning greener vehicles.



4. Exploring climate-friendly residential cooling solutions

Under the Mission Innovation project of the Government of India, the Department of Science and Technology has been providing support to Alliance for an Energy-Efficient Economy (AEEE) to comprehensively support the Global Cooling Prize outreach activities through the prize period of two years (2018-2020).

The main objective of this project is to start a cooling revolution through the Global Cooling Prize. The purpose is to spur the development of a radically more energy-efficient cooling technology. Through this competition, we are aiming to identify innovative cooling technologies that could reduce the climate impact of Residential Air Conditioning (RAC) at least by 5X times.

Over the course of two years, innovators have had an opportunity to develop, test, and demonstrate their transformative cooling solutions to the world. During the program, AEEE has led India-specific partner engagement, outreach and communications, participant recruitment and engagement, and have organized and managed India-specific events for the Global Cooling Prize.

During the competition, over 2,100 registrations from 95 countries were received for the contest, and 445 teams submitted their preliminary ideas. Out of them, 139 teams from 31 countries followed through with detailed technical proposals, and eight teams made it to the contest's final round.

Following the announcement of two Grand Winners during the award ceremony on April 29, 2021, we have reached the Global Cooling Prize conclusion. What many people thought was an impossible task two and a half years ago - developing a cooling solution with 5X lower climate impact - is now a reality and here today.

The two-year-long competition concluded on April 29 with the announcement of two Grand Winners during the award ceremony.

Gree Electric Appliances, Inc. of Zhuhai with partner Tsinghua University; and Daikin with partner Nikken Sekkei Ltd. emerged as the two winners among eight Finalists after shattering the perceived ceiling of performance. These companies have produced prototypes that have five times (5X) less climate impact than standard air conditioning units available in the market today. When scaled, such technologies can prevent 132 GT of CO₂-equivalent emissions cumulatively between now and 2050 and mitigate over 0.5°C of global warming by the end of the century.

TWO GRAND PRIZE WINNERS



5. Mapping energy consumption for a cleaner tomorrow

Anil Kumar Jain, Secretary of Coal Ministry, Government of India, inaugurated AEEE's Dynamic Energy and Environmental Quality Data Management Dashboard, on 24 March 2021. Being the first-ever real time energy dashboard in India, it maps electricity consumption and air quality patterns of the AEEE office, helping us understand our energy demand thoroughly. This is a critical move to inducing behavioural change for a cleaner tomorrow.

AEEE's energy dashboard stems from our awareness of what we want to measure and why. Public disclosure of our dashboard demonstrates the possibility of quick, data-driven decisions with the right approach, especially for energy efficiency, where processes like energy audits are often considered tedious and time consuming.



AEEE president Satish Kumar welcomes Anil Kumar Jain for the launch of AEEE's energy dashboard



PARTNERSHIPS AND MOU



AEEE has partnered with United for Efficiency (U4E) for progressing the global agenda to transition towards efficient appliances to unlock the very significant economic, social and environmental benefits with affordable, higher performance products and modern energy systems.



AEEE became a core member of ISHRAE's Technical Group - F101: Evaporative Cooling system and is supporting the development of the 'Standard for Construction, Performance, and Testing of Ducted & Non-Ducted Direct evaporative cooling units'. AEEE has contributed to the finalization of scope (AEEE's input: inclusion of MEPS and the construction material) and the standard title.



AEEE signed an MoU with Eurovent Certita Certification (ECC) to develop Minimum Energy Performance Standards (MEPS) of evaporative air coolers and knowledge sharing & technical assistance.



AEEE signed an MoU with Climate Smart City Alliance Framework (CSCAF) to facilitate Eco Niwas Samhita (ENS) implementation across India's residential sector and enhance capacity building & knowledge sharing.



AEEE signed an MoU with Energy Efficiency Services Limited (EESL), which focuses on diagnostic studies and developing a policy roadmap for cold storage retrofit.



Signed an MoU with Central Coalfields Limited (CCL), that seeks to identify opportunities for enhancing energy efficiency in CCL facilities. The MoU focuses on providing assistance to CCL for developing an overall energy efficiency roadmap for buildings, mining operations and heavy earth-moving machinery.

GOVERNMENT AND OTHER ENGAGEMENT

AEEE has been part of government committees, working groups, and consultations over the last few years. In our endeavour to expand outreach and engagement, we have, during 2020-21, also been pro-active in submitting comments on government policies, reports, and draft regulations and in pitching for peer reviews.

1. BUILDINGS AND COMMUNITIES

◆ Review of government policies, reports, and regulations

- Submitted comments on Draft EIA Notification 2020
- Submitted comments on Draft Policy Framework for Developing and Promoting Decentralized Renewable Energy (DRE) Livelihood Applications in Rural Areas
- Submitted comments on Draft Data Centre Policy 2020

◆ Participation in government committees, working groups, and consultations

- Indian Society of Heating, Refrigerating and Air Conditioning Engineers' (ISHRAE) technical group 'F101: Evaporative Cooling system', to develop standards on construction, performance, and testing of ducted and non-ducted direct evaporative cooling units
- United for Efficiency's (U4E) Commercial Refrigeration Model Regulation Guidelines Development initiative to develop model regulation guidelines for commercial refrigeration systems
- UNEP Cool Coalition's working group on National Cooling Action Plan (NCAP) to develop a global NCAP development methodology that can help national governments conduct a holistic assessment of their countries' cooling current and projected cooling demand
- India Cooling Action Plan's (ICAP) [an initiative led by Ministry of Environment, Forest and Climate Change's (MoEF&CC)] thematic working group on cold chain to operationalise the recommendations of the ICAP in the cold chain sector. AEEE is leading this working group.
- India Cooling Action Plan's (ICAP) [an initiative led by Ministry of Environment, Forest and Climate Change's (MoEF&CC)] thematic working group on space cooling to operationalise the recommendations of the ICAP in the space cooling sector. AEEE is leading this working group.
- Climate Smart Cities Assessment Framework's [an initiative led by Ministry of Housing and Urban Affairs (MoHUA)] working group on energy and buildings, to drive implementation of energy efficiency in residential buildings in 100 Smart Cities under the Smart City Mission

2. POWER UTILITY AND ELECTRIC MOBILITY

◆ Review of government policies, reports, and regulations

- Submitted comments on IEA-BEE Report on 'Energy Efficiency for Economic Recovery: A Discussion Paper'
- Submitted comments on Proposed Amendments to Electricity Act 2003
- Submitted comments and Suggestions on Draft Power Market Regulations 2020
- Submitted comments on Draft Rights of Consumers Electricity Rules 2020
- Submitted comments on Specific Requirements for Electric Power Train of Vehicles
- Submitted a note on Mumbai Power Outage 2020
- A special review on Dissecting India's Electricity Tariff Landscape for EVs
- Submitted comments on the Central Electricity Authority (CEA) Portal

◆ Participation in government committees, working groups, and consultations

- Dept. of Science & Technology (DST) and Principal Scientific Adviser's working group on the development of standards for Light Electric Vehicles



3. INDUSTRIAL ENERGY EFFICIENCY

◆ Review of government policies, reports, and regulations

- Submitted comments on IEA-BEE Report on 'Energy Efficiency for Economic Recovery: A Discussion Paper'
- Submitted comments on the Central Electricity Authority (CEA) Portal
- Submitted comments on Proposed Amendments to Electricity Act 2003

◆ Participation in government committees, working groups, and consultations

- Working Technical Group's [WTG, an initiative led by The Global Environment Facility (GEF) and UNIDO] MSME-EESL Project for promoting market transformation for energy efficiency in MSMEs

◆ Peer reviews

- Peer review of CEEW- India Residential Energy Survey (IRES)
- Provided inputs to International Energy Agency's (IEA) 'Energy Efficiency Investment & Finance' survey
- Provided inputs to Asia-Pacific ESCO Industry Alliance's (APEIA) ESCO market survey



4. ENERGY DATA SERVICES AND STATE AND LOCAL ACTION

◆ Review of government policies, reports, and regulations

- Submitted comments on the Central Electricity Authority (CEA) Portal
- Submitted comments on Non-Personal Data Governance Framework
- Submitted comments on Ministry of New and Renewable Energy's (MNRE) draft policy on Distributed Renewable Energy (DRE) for Livelihood Applications
- Submitted comments on Draft Electricity Rights of Consumers Rules 2020

◆ Participation in government committees, working groups, and consultations

- Invited to attend one meeting of the BIS LITD10 committee in “listen-only” mode

◆ Peer reviews

- Review of International Energy Agency's (IEA) India Energy Outlook 2021



RESEARCH LANDSCAPE

INSIGHTS OF WORK DONE BY AEEE PROGRAM VERTICALS

1. BUILDINGS AND COMMUNITIES (B&C)



ADVANCING ENERGY EFFICIENCY, EQUITY AND VISIBILITY OF ENERGY IN BUILDINGS AND COMMUNITIES

To create social value and targeted impact in the specific areas of thermal comfort for all, energy access and food security by undertaking cutting-edge research and analysis, policy advocacy and implementation, market transformation, and creating tools and other knowledge products.

INITIATIVES AND ACHIEVEMENTS 2020-21

- ◆ SHEETAL program to facilitate the roll out of India's sustainable cooling agenda: Supported by ClIFF, The Alliance for Sustainable Habitat, Energy Efficiency and Thermal Comfort (SHEETAL) is a consortium of Civil society organisations led by The Energy and Resource Institute (TERI) with the Alliance for an Energy Efficient Economy (AEEE), and the Council on Energy, Environment and Water (CEEW).

SHEETAL convene different line ministries and international and domestic cooling policy experts to collaborate and synergise actions to accelerate sustainable cooling in India.”

- ◆ Facilitating Eco-Niwas Samhita implementation in affordable housing: Developed a policy strategy to increase the adoption of ENS in India through a replicable implementation framework and a strategically designed toolkit.

- ◆ Mapping of existing residential sector energy efficiency policies and guidelines in Uttarakhand: Research work to support MoEFCC's National Mission on Himalayan Studies (NMHS) which aims at supporting climate-responsive and low-carbon development in the state of Uttarakhand by addressing the critical urban issue in its existing residential sector.

- ◆ Global NCAP development methodology: AEEE, under the aegis of Cool Coalition, Kigali Cooling Efficiency Program (K-CEP), United Nations Economic and Social Commission for Asia and the Pacific (UNESCAP), and supported by the National Cooling Action Plan (NCAP) Working Group, is developing a global NCAP development methodology that can help national governments conduct a holistic assessment of their countries current and projected cooling demand and develop NCAPs.

It is a first-of-its-kind guide map that can be readily adapted to fit a country's specific context and priorities.

- ◆ AEEE (Secretariat) worked towards defining the Coalitions goals and objectives through its Charter & Governance framework, positioned India Cooling Coalition as an independent and robust entity (new logo and website), and worked towards developing an active community of knowledge exchange, engagement, and collaboration for facilitating the implementation of ICAP (webinar series).

- ◆ Multi-year project with GIZ on District Cooling implementation in India: The project aims to support the Bureau of Energy Efficiency (BEE) and Ministry of Environment Forest and Climate Change (MoEF&CC) in implementing the India Cooling Action Plan (ICAP) regarding energy-efficient District Cooling Systems (DCS) and envisions on developing enabling conditions for faster implementation of DCS in India. The project intends to reduce cooling-related greenhouse gas emissions in the Indian building sector (compared to the business as usual scenario).

- ◆ Completed a first of its kind World Bank assignment on Cold Chain energy efficiency in India. Analysis of energy efficiency opportunities in the packhouse segment was carried out, and policy and regulatory recommendations were submitted to the Bureau of Energy Efficiency (BEE) to enhance India's pack-houses' energy efficiency.

With the ongoing global sweep in the way we all approach energy, there is an urgent need to address different spheres of the way we live in today's world. The three critical factors, namely - housing, food, and health, must be looked at in amalgamation. While efforts to support the transition to a better tomorrow are underway through various policies and reforms, we cannot repudiate the importance of industry partners to introduce energy-efficient and climate-friendly interventions in the current building construction and cold chain practices across India.



Tarun Garg
Program Lead, Buildings
and Communities (B&C)

2. POWER UTILITY AND ELECTRIC MOBILITY (PU&EM)



SUSTAINABLE TRANSITION OF POWER SECTOR AND MOBILITY THROUGH ENERGY EFFICIENCY AND DEMAND MANAGEMENT

In today's carbon-constrained world, electricity and mobility sectors are on the cusp of transformation. AEEE's electric mobility research focuses on nudging electric vehicle adoption, supporting electrification of fleets and managing the vehicle to grid integration. AEEE's power utility strategy focuses on electricity distribution and aims to unlock demand flexibility to address the challenges of the Indian power sector. The team brings in a unique value proposition by undertaking in-depth research and stakeholder engagement to bridge knowledge-gaps, and by facilitating policy and regulatory reforms.

INITIATIVES AND ACHIEVEMENTS 2020-21

- ◆ The PUEM team has continued to track the developments in the e-mobility space and strengthened the research initiatives to accelerate the adoption of EVs in India through knowledge products to address the barriers. The team has mapped the existing best practices associated with charging and vehicle to grid integration. To support decision making the team has developed multi-criteria decision-making tools, and roadmaps for the future mobility ecosystem in India. Our expertise within the EV charging space is iterated in the four reports that we published in FY 20-21 viz.

1. Charging India's Four-Wheeler Transport:

This study aims to facilitate the planning and establishment of public e-4W charging infrastructure in Indian cities.



2. Charging India's Two and Three-Wheeler Transport: This guide for planning charging infrastructure for 2-and 3-wheeler fleets in India sheds light on the kind of infrastructure required for commercial light electric vehicles.



3. EV-A new entrant to India's Electricity Consumer Basket: The study focuses on the implications of EV charging on DISCOMS. It highlights the need to factor in future EV charging in its (DISCOM) resource and investment planning.



4. Vehicle-Grid Integration (VGI): A new frontier for electric mobility in India: This study aims to present the evolving concept of Vehicle-Grid Integration and its different elements and analyse the feasibility of its implementation in the Indian context.



As India strives towards achieving its decarbonisation goals in transport and power sectors, there is a vital need to understand the interlinkages between these two carbon intensive sectors. While efforts are underway to support economic recovery from Covid induced lockdown, the role of think tanks is to pave the way to a green transition. The stimulus measures and reforms present a unique window of opportunity for the industry to strategically realign India's development plans with climate and environment objectives.



Chandana Sasidharan
Principal Research Associate,
Power Utility and Electric
Mobility (PU&EM)

3. INDUSTRIAL ENERGY EFFICIENCY (IEE)



ACCELERATING INDUSTRY TRANSITION TO A SUSTAINABLE LOW CARBON ECONOMY

The IEE team focuses on hard to abate cement and steel industry and small and medium enterprises (SMEs) in India, to enable industry transition. The work done is in collaboration with industry partners on mitigation strategies such as enhanced energy efficiency, technological innovation, demand reduction and data-enabled energy management to realise climate goals.

INITIATIVES AND ACHIEVEMENTS 2020-21

- ◆ Published a report on energy data management for residential and commercial buildings in India. The report provides an in-depth assessment of existing top-down and bottom-up data collection frameworks, existing institutional set-up and identifies key data gaps in estimating key performance indicators for policymaking.
- ◆ Published a report on low carbon approaches for decarbonisation of building construction. It identifies and assesses the current status of material demand reduction strategies including alternate low carbon cement, circular economy, and design optimization among others.
- ◆ Organised webinars on “Actions towards a billion-dollar ESCO market” and “Decarbonizing building construction in India”



There is an urgent need for increased investment towards low carbon, sustainable and resilient approaches in the Industrial sector to realise climate goals.



Deepak Tewari
Principal Research Associate,
Industrial Energy Efficiency (IEE)

4. STATE AND LOCAL ACTION (SLA)



ADVOCATING ENERGY EFFICIENCY AS AN INTEGRAL PART OF STATE AND LOCAL DEVELOPMENT POLICY

The State & Local Actions team advocates Energy Efficiency as an integral part of State development policy. We work to strengthen states' institutional capacity to use data to identify & monitor EE interventions using the State EE Index. We support states in EE policy formulation and provide a convening platform for SDAs and Industry.

INITIATIVES AND ACHIEVEMENTS 2020-21

❖ State Energy Efficiency Index (SEEI) 2020 –

SEEI 2020 is the third annual energy efficiency index to assess energy efficiency implementation across all demand sectors – buildings, industry, municipalities, transport, agriculture and DISCOMs – along with cross sector initiatives in India's 36 states and Union Territories.

- SEEI 2020 has 68 qualitative, quantitative, and outcome-based indicators across all sectors, looking at policy & regulation, financing mechanisms, institutional capacity, adoption of EE measures and energy savings. The indicators were finalized in consultation with BEE.
- Prior to starting SEEI 2020, a feedback survey on SEEI 2019 was conducted with the 36 SDAs, of which 22 responded. 72% of SDAs said that the annual index helps them improve data collection on energy efficiency while 77% said that the index helps them track the state's progress in energy efficiency.
- A dedicated portal was developed to institutionalise data collection from the SDAs and streamline the process for energy data management.
- A series of industry round tables was organized with Energy Management Centre, Kerala (SDA), in which 24 companies participated. AEEE plans to conduct similar round tables with other SDAs in 2021.
- 4 regional virtual workshops were conducted to elucidate the SDAs on the requisite steps in the SEEI 2020 exercise and to guide them with relevant data collection from the concerned departments as well as to encourage healthy competition among the states.
- In addition to data submitted by SDAs, AEEE has collected data from CII, EESL, IGBC, GRIHA, GBCI and BEE. The Data review process with BEE is ongoing, in preparation for the launch of SEEI 2020.

❖ Improving Rural Livelihoods Through EE Cooling & Refrigeration in India

The project, funded by Good Energies Foundation, is centred around the use of energy efficient cooling solutions for off-grid and weak-grid rural communities to:

- Reduce food loss through the uptake of agricultural applications such as pre-cooling, staging cold room, cold storage, etc.
- Provide cold-storage facilities in rural healthcare centres
- Build additional income opportunities for rural productive businesses and manufacturers of cooling solutions.

The project will support Government of India's Sustainable Development Goals (SDG) - Zero hunger through improved food security, Good health and well-being through access to better health and services, Climate change mitigation and Affordable clean energy through addressing climate change.

AEEE provides a platform for stakeholder engagement for SDAs and the industry. The team organises SDA-industry roundtables that facilitate dialogue among industry leaders and SDAs to target energy efficiency programs for consumers and industry in the state. It also provides business opportunities for Original Equipment Manufacturers (OEMs) and companies offering energy-efficient products and services.



Sangeeta Mathew
Program Lead, State and Local
Action (SLA) & Energy Data
Services (EDS)

5. ENERGY DATA SERVICES (EDS)



CREATING VALUE FROM END-USE ENERGY DATA TO EMPOWER POLICYMAKERS, CONSUMERS AND THE ENERGY EFFICIENCY MARKET

Energy Data Services is a cross-cutting team at AEEE. It focuses on closing gaps in end-use energy consumption data, turning such data into useful insights, and creating analytical tools. Its end objective is to support data-driven policymaking, spur markets for energy efficiency products and services, and nudge consumer behaviour.

INITIATIVES AND ACHIEVEMENTS 2020-21

- ❖ Towards Climate-smart Hospitals in India: India's first hospital energy survey across 5 climate zones, 18 states, 2400 hospitals
 - AEEE in collaboration with the Centre for Chronic Disease Control (CCDC) is undertaking the first-ever nationwide energy survey in India to characterize the energy use of hospitals.
 - The survey, which comprises 75-100 data points per hospital, will cover public and private hospitals.
 - The baseline energy assessment of a representative sample of Indian hospitals can be leveraged to facilitate the promotion and uptake of cleaner, sustainable energy use through policies and programs.
- ❖ Development of a concept note for India Building Energy Consumption Survey - Commercial (IBECS-C)
 - The team defined the value streams of granular, operational end-use energy consumption data in the commercial building sector using expert interviews & consultations and existing literature for various beneficiary groups. These groups included the private sector (i.e., enterprises and energy technology companies), policymakers, researchers, and DISCOMs. These use-cases will be utilised as the foundational stepping stone towards institutionalising the IBECS-C to create a national sample statistic of energy end-use data in hotels, hospitals and IT & ITeS buildings to support national energy management.
 - This approach will be enriched using EDS's learnings and experiences from the hospital energy survey being conducted in collaboration with CCDC.
- ❖ Development of a comprehensive concept note for India Green Button Alliance
 - Building up from the US' Green Button Alliance, the EDS team probed into the potential of effecting energy efficiency interventions by using a standardised energy end-use data-sharing framework. This concept note will build on how end-use energy data is shared with consumers in other countries and that in India. The different consumption sectors defined are residential, commercial, and industrial sectors.
 - The concept note was socialised in the form of a paper 'Access to Standardised, Transparent, and Granular Electricity Consumption Data: A Novel Engagement Model for the Indian Consumer', which is stated to be published in the proceedings of the India Smart Utility Week 2021
- ❖ The EDS team unpacked the data in high-impact reports/publications that AEEE contributed to create engaging data stories and dashboards:
 - [India Cooling Action Plan - A Guided Graphical Tour](#)
 - [State EV Tariff Map](#)
 - Charging Infrastructure Planning Tools for
 - [Electric buses](#)
 - [Electric Four Wheelers \(HV\)](#)
 - [Electric Four Wheelers \(LV\)](#)
- ❖ Paper on 'Access to Standardised, Transparent, and Granular Electricity Consumption Data: A Novel Engagement Model for the Indian Consumer' accepted for publication for India Smart Grid Forum (ISUG) 2021

The EDS team is working to institutionalise the India Buildings Energy Consumption Survey – Commercial (IBECS-C) to enable enterprise-level energy use management and GHG emission reductions. Access to periodical and granular energy end-use data will enable large enterprise-level consumers to compare their energy performance with their peers. It will equip them to differentiate their buildings in the real estate market on the basis of their energy footprint. It will also spur a demand for energy technology companies such as energy data analytics (such as IoT, building energy management companies, etc.), equipment manufacturers, facility managers, ESCOs, etc.

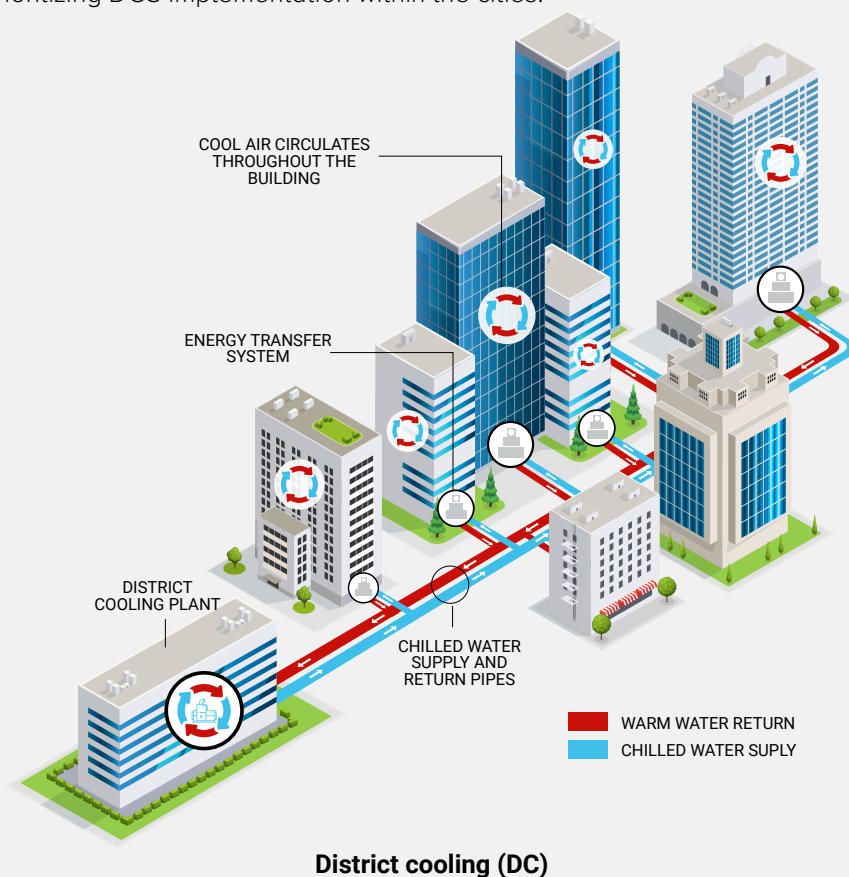


Sangeeta Mathew
Program Lead, State and
Local Action (SLA) & Energy
Data Services (EDS)

SHAPING THE ENERGY EFFICIENCY 2021 AGENDA

1. BUILDINGS AND COMMUNITIES

- ◆ The agenda of thermal comfort and energy efficiency in the residential buildings will be further driven through
 - Development of a material & technology compendium accompanied with procurement guidelines.
 - Development of an ENS compliance mechanism (toolkit)
 - Development of a comprehensive set of guidelines focusing on climate responsive and low carbon development for the residential buildings in Uttarakhand.
 - Design context-specific recommendations for generating an effective and culturally appropriate behaviour change communications (BCC) strategy for driving the agenda of Adaptive Thermal Comfort.
- ◆ In district cooling project, adequate support will be provided to the state governments for the implementation of DCS in selected demonstration projects. The project will also help bridge the knowledge gap for creating innovative business models to accelerate investment and mainstream DCS. These activities will involve rigorous consultations with national and international experts, financial institutions, state councils, and regional authorities for identifying barriers and prioritizing DCS implementation within the cities.



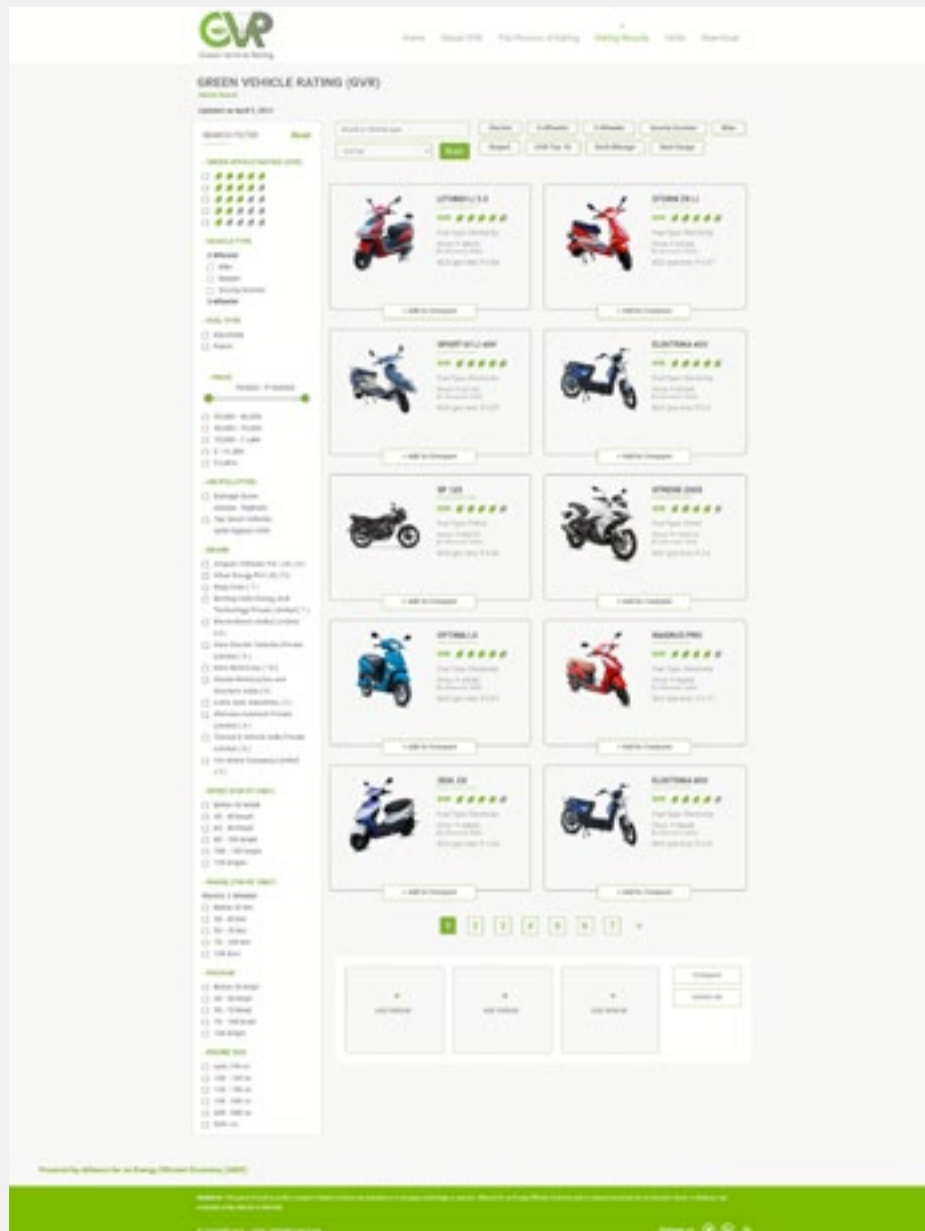
-
- ◆ The National Cooling Action Plan (NCAP) methodology will be developed for Cambodia and Indonesia.
-
- ◆ AEEE is working with an objective to reduce food waste, enhance farmers' incomes and improve the handling of food and medicinal products through a more energy efficient and climate-friendly cold chain. Our work is leading to improved information on multiple benefits of energy efficiency and sustainability in the cold chain infrastructure and greater alignment between different stakeholders, particularly within the select states and between the centre and the states.
 - Report/White paper on scenario mapping of cold chain in India to recommend a facilitative cross cutting policy regime for cold chain infrastructure
 - Analysis of Cold Storage infrastructure in West Bengal to identify Retrofitting opportunities in the ESCO model
 - Support pilot implementation at select cold storage facilities
 - Support EESL and/or other ESCOs in rolling out large scale cold storage retrofit (modernization) program
 - Model design and O&M guidelines for pack house and other components
 - Report/White paper on scenario mapping of immunization supply cold chain in India



2. PUBLIC UTILITY AND ELECTRIC MOBILITY

Widening our research canvas, the PUEM team plans to adopt a multi-pronged approach to tackle demand management and promote electric mobility in India in the upcoming year. We are gearing up to deliver impactful outcomes on the following prospects:

- ❖ **Green Vehicle Rating:** AEEE has pioneered the Green Vehicle Rating (GVR), the country's only vehicle rating system based on environmental performance. GVR serves as a consumer information tool that identifies high to low performing vehicle models, in two and three-wheeler categories, in terms of the negative impacts of GHG emissions and criteria pollutants released from tailpipes of top-selling models. In this edition of GVR, the scope is widened to include both ICE and EV models of two and three wheelers.



-
- ◆ The role of energy efficiency and demand management in India's energy future: AEEE is planning to provide thought leadership to unlock the potential of demand flexibility in India. The PUEM team intends to bring out significance of demand response and demand flexibility in the energy transition of India through dedicated efforts to engage key power sector stakeholders and industry. To promote utilisation of demand as a resource and enable a market for demand aggregation, the team would roll out a set of whitepapers and webinars with the support of industry.

3. INDUSTRIAL ENERGY EFFICIENCY

-
- ◆ We will work with construction sector stakeholders to identify challenges for constructing net-zero buildings (with a focus on embodied emissions) and create an enabling framework for accelerating the uptake of low carbon options.
-
- ◆ We will work with small and medium enterprises to build post-COVID resilience by accelerating the deployment of cleantech solutions through awareness creation, skill enhancement and scale-up through replication.
-
- ◆ We will work with corporates to accelerate industry commitment for energy efficiency in post COVID era to meet NDC commitments.



4. STATE AND LOCAL ACTION

- ◆ Launch State Energy Efficiency Index (SEEI) 2020

State Energy Efficiency Index 2020

The State Energy Efficiency Index 2020 has been jointly developed by the Bureau of Energy Efficiency (BEE) and Alliance for an Energy Efficient Economy (AEEE) with the following objectives:



Help drive EE policies and programme implementation at the state and local level



Highlight best practices and encourage healthy competition among states



Track progress in managing the states' and India's energy footprint



Set a baseline for EE initiatives and provide a foundation to set state-specific EE targets



Institutionalise data capture and monitoring of EE activities by states, especially by SDAs

- ◆ Complete needs assessment for cooling solutions in agriculture and rural healthcare and identify 2 districts in 2 states in which to deploy optimal cooling solutions, which will be monitored for a year to assess their impact in improving rural livelihoods, as well as their energy and carbon footprint. This activity will help identify optimal sustainable cooling solutions to scale up.
- ◆ Work with selected State Development Authorities to identify and support state-specific energy efficiency interventions.

5. ENERGY DATA SERVICES

- ◆ Building and leading the Building Efficiency Coalition (BEC) of private sector members (i.e. enterprises and energy technology companies), along with some public sector and knowledge sector members, to collectively lead the charge towards designing and implementing the first iteration of IBECS-C.
- ◆ Developing a common information-sharing model for end-use energy data (India Green Button Alliance) by definitely defining its main components – metadata, standard and protocol, testing and compliance, data privacy and security, stakeholders, and regulations.
- ◆ Preparing and publishing powerful data visualisations, including linking macro socio-economic data with energy end-use consumption at the national, state and local levels across consumer and fuel types.



ENERGY ENABLERS

AEEE is a convening platform bringing together key energy stakeholders- industry, government, civil society organisations, and professionals, to engage in a constructive dialogue, influencing effective and impactful policies to build a robust ecosystem for effective implementation.

AEEE MEMBERS

At present, AEEE has 40 members, representing diverse segments of the energy efficiency (EE) industry such as technology, equipment and service providers, research and academia, consulting companies, and varied energy end-users committed to energy efficiency. AEEE follows a participatory approach involving members and seeking guidance from its knowledge partners and peer organisations. With a host of benefits and customised services, the AEEE membership offers an exclusive opportunity to lead the growth and transformation of the energy sector, participate in policy dialogues, and enhanced visibility and credibility for all its members.

Premium Members



Large Members

ORACLE
Utilities

signify

General Members

AGNISUPURKH
Energy Storage Technology

ARMSTRONG

ATOMBERG
TECHNOLOGIES

Baghirathi

CEPT
UNIVERSITY

ckinetics
Accounting Sustainability

covestro

EESL

ENCON
Energy Management Services PVT. LTD.

EnergyTech
RENEWABLES

ENGIE

MP ENSYSTEMS

HMX
COOLING & HEATING



**INTERNATIONAL INSTITUTE ON
INFORMATION TECHNOLOGY**
IIIT

jenefco

SHAKTI
POWERHOUSE

SEEtch
Energy Storage & Energy Solutions



TORO

VASUKI
Superior Power Solutions

**VIVEKANANDA GLOBAL
UNIVERSITY, JAIPUR**

Associate

aeon

aspiration **energy**

BSES
BSES Yamuna Power Limited

GSH

Idam
Idam Infrastructure Advisory Pvt. Ltd.

STENUM Asia

SUNMEISTER
Solar Integrators & Energy Auditors

AEEE LEADERSHIP

The 11th Annual General Meeting, held on 29 August 2019, elected the Executive Council of Alliance for Energy Efficient Economy (AEEE) for the term 2019-2021. The council is chaired by Upendra Bhatt, Managing Director of cKinetics, and brings with it expertise, experience, and knowledge of many seasoned professionals to shape the course of AEEE's work in future.



SECRETARIAT LEADERSHIP

The appointed leadership, along with President Satish Kumar, will lead the industry body to carry out its wide array of objectives for the next two (2) years in support of the country's resource efficiency and low carbon development agenda.

EC Members Elected for 2019-2021

Name	Position in EC	Designation & Company
Upendra Bhatt	Chairperson	Managing Director, cKinetics Consulting Services Pvt Ltd
Mr Prabal Bose	Member	Vice President
Mr Venkat Garimella	Treasurer	Vice President – S&A, EE, A2E & CSR International Operations, Schneider Electric
Mr Ranganath N Krishna	Member	The Grundfos Ambassador, Grundfos Pumps India
Prof Rajan Rawal	Member	Executive Director, CARBSE, CEPT Univ
Arjun Premchand Gupta	Member	Founder & CEO, Smart Joules Pvt Ltd
Chirag Baijal	Member	Managing Director, HVAC, Carrier Aircon
Saurabh Kumar	Member	Managing Director, EESL
Unnikrishnan	Member	Managing Director, Saint Gobain
Darshi Dhaliwal	Member	CTO, Toro Watt Corp
Satish Kumar	Secretary	President & Executive Director, AEEE
Shalini Sarin	Invited Member	Director, Elektromobilitat
Pramod Deo	Invited Member	Former IAS Officer, CERC and MERC Chairman
Sanjiv Aggarwal	Invited Member	Partner, Actis



AEEE's President and Executive Director works directly with the Board, i.e., the Executive Council (EC). To enable effective governance and coordination, AEEE's operational matters are overseen by a Management Committee, comprising of the Chairperson, Vice-Chairperson, and a Treasurer.

Additionally, to guide the AEEE Secretariat further, the EC is categorised into three sub-committees:

Sub-Committee

HR and Compensation Committee	F & A Committee	Programs and Projects Committee
Dr Shalini Sarin (Acting Covenor)	Venkat Garimella - Convener	Chirag Bajjal- Convener
Arjun Gupta	Mr. Sanjiv Bhatia (non-EC participant)	A.R. Unnikrishnan- Co-Convener
Venkat Garimella	Upendra Bhatt	Rajan Rawal
Upendra Bhatt	Ranganath Krishna – Outgoing Treasurer	Darshi Dhaliwal
		Upendra Bhatt

Roles & Responsibility of Sub-Committees



FINANCE AND AUDIT COMMITTEE:

provides oversight on budgets, organisational spends, budget approvals for capital expenditure, new projects, and programmes



REMUNERATIONS AND HR POLICY COMMITTEE:

provides oversight on HR policies, conducts senior leadership performance reviews, approves annual increments and/or senior hires



PROGRAMMES AND PROJECTS OVERSIGHT COMMITTEE:

ensures proper functioning and alignment of AEEE programmes with its vision and mission

OUR TEAM

AEEE has on board domain experts and dedicated professionals who are actively engaged in taking AEEE's work to greater heights in alignment with its larger vision and mission. The team at present is as follows:

Sr. No.	Team Members	Designation
Core Team		
1	Aafsha Kansal	Research Associate
2	Akash Goenka	Senior Research Associate
3	Akhil Singhal	Senior Research Associate
4	Anu Raswant	HR & Secretarial
5	Arzoo Kumari	Research Trainee
6	Bhairav Sharma	Assistant Manager- Membership & Training
7	Bhawna Tyagi	Senior Research Associate
8	Chandana Sasidharan	Senior Research Associate
9	Deepak Tewari	Principal Research Associate
10	Dharini Sridharan	Research Associate
11	Gerry George	Senior Research Associate
12	Jayanta Chaudhuri	Director- Marketing, Alliances and Partnerships
13	Khushboo Gupta	Senior Research Associate
14	Kriti Khurana	Research Associate
15	Nitin Kesar	Manager- Communications
16	Priyami Dutta	Senior Research Associate
17	Radhika Israni	Digital Communications Officer
18	Rakesh Goswami	Director- Finance & Operations
19	Reshma Verma	Manager- Office & Administration
20	Sandeep Kachhawa	Principal Research Associate
21	Sangeeta Mathew	Program Lead
22	Sanjay Chaurasia	Assistant Manager- Graphics & DTP Designer
23	Satish Kumar	President and Executive Director
24	Shatakshi Suman	Senior Research Associate
25	Shirish Bhardwaj	Research Associate
26	Shravani Itkelwar	Research Associate
27	Simrat Kaur	Research Associate
28	Srishti Sharma	Research Associate
29	Sumit Kumar	Assistant Accounts Manager
30	Tarun Garg	Program Lead
Advisors		
1	Sneha Sachar	Strategic Advisor
2	Bhaskar Natarajan	Senior Advisor
3	Prasad Vaidya	Senior Advisor
Consultants		
1	Shruti Saraf	Consultant, Alliances and Communications
2	Ishan Bhand	Research
3	Gaurav Vakil	Consultant, Buildings & Communities
4	Jagadeesh Taluri	Consultant, Building and Communities

OUTREACH



Webinar on policy landscape and industry initiatives for efficient space cooling appliances on 11 November 2020. The event was attended by 73 participants. Visible above are Shubhashis Dey (Associate Director, Shakti Sustainable Energy Foundation), Alex Hillbrand (Energy Efficiency and Climate Advocate, Natural Resources Defence Council), Neha Dhingra (CLASP), Aditya Chuneekar (Senior Research Associate, Prayas), and Jitendra Bhambure (ISHRAE).



Launch of the report 'Vehicle-Grid Integration – A New Frontier For Electric Mobility In India' on 7 October 2020, followed by a panel discussion on Enabling EV Adoption in India. Visible above are Prabir Neogi, Chief Advisor – Corporate Affairs, RP-Sanjiv Goenka Group, Awadhesh Jha, Vice President – Charge & Drive and Sustainability, Fortum Charge & Drive, Dr Rahul Walawalkar, President, India Energy Storage Alliance, Abhishek Ranjan, AVP, BSES Rajdhani Private Limited, Vish Ganti, VP & Managing Director, AutoGrid INDIA and Nishant Saini, Managing Director, eee-Taxi. The event was attended by 56 participants.

Launch of the report 'A Policy Strategy for Decarbonising the Building Sector: Facilitating Eco Niwas Samhita' on 28 October 2020, followed by a panel discussion on challenges in adopting and implementing Eco Niwas Samhita codes at the Urban Local Body (ULB) level. The event was attended by 99 participants. Visible above are Simrat (Research Analyst at AEEE) and Peter Graham (Executive Director, Global Buildings Performance Network).



Webinar on consumer understanding of cooling appliances energy efficiency on 5 November 2020, organised by India Cooling Coalition, attended by Satish Kumar (Founder and President of AEEE) as a speaker. The event was attended by 97 participants. Visible above are Satish Kumar (President and Executive Director, AEEE), Simrat Kaur (Research Analyst, AEEE), Anna Agarwal (Fellow, Centre for Policy Research), and Jitendra Nalwaya (Vice President, BSES Delhi).

Webinar on 'Actions towards a billion-dollar ESCO market' on 5 November 2020. The event was attended by 82 participants. Visible above are Satish Kumar (President and Executive Director, AEEE), Arijit Sengupta (Director, Bureau of Energy Efficiency), Arjun Gupta (Founder and CEO, Smart Joules), and Milind Chittawar (SEETech Solutions).



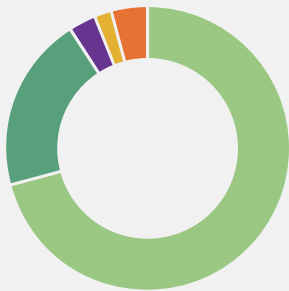
AEEE EVENTS & TRAINING CALENDAR APRIL 2020 TO MARCH 2021

Outreach to Members and Stakeholders through AEEE Events

Sl.no	Event Type	Theme	Venue	Date	Participants
1	Round Table	India Cooling Coalition	Zoom meeting	May 20, 2020	17
2	Report Dissemination	e-launch of "Charging India's Four-Wheeler Transport" report	Go-To Webinar platform	May 29, 2020	111
3	Webinar	Indirect Evaporative Cooling - a safer and energy efficient approach to HVAC	Go-To Webinar platform	June 9, 2020	307
4	Report Dissemination	e-launch of "EV - A New Entrant to India's Electricity Consumer-Basket"	Go-To Webinar platform	July 31, 2020	120
5	Round Table 1	Discussion with AEEE Premium Members Offering Energy-Efficient Products & Services to promote Energy Efficiency in the State of Kerala	Go-To Webinar platform	August 20, 2020	16
6	Training & Certification program	19th Round Certified M&V Professional Training & Exam	Zoom meeting	Aug 27-29, 2020	19
7	Webinar	Implementation Strategies for India Cooling Action Plan	Go-To Webinar platform	Sept. 2, 2020	239
8	Round Table 2	Discussion with Appliance manufacturers Offering EE Products & Services to promote EE in the State of Kerala	Go-To Webinar platform	Sept. 3, 2020	19
9	Report Dissemination	e-Launch of Charging India's Two- and Three-Wheeler Transport	Go-To Webinar platform	Sept. 4, 2020	94
10	Workshop	State EE Index 2020 SDA Workshop – North Region	BEE MS Teams platform	15 Sep 2020	45+
11	Workshop	State EE Index 2020 SDA Workshop – South Region	BEE MS Teams platform	16 Sep 2020	30+
12	Workshop	State EE Index 2020 SDA Workshop – East Region	BEE MS Teams platform	17 Sep 2020	30
13	Workshop	State EE Index 2020 SDA Workshop – West Region	BEE MS Teams platform	18 Sep 2020	40
14	Roundtable 3	Roundtable Discussion with Companies Offering Energy-Efficient Products & Services to Promote Energy Efficiency in the State of Kerala "Industry Sector"	Go-To Webinar platform	23rd Sept. 2020	20
15	Report Dissemination	Vehicle-Grid Integration – A New Frontier for Electric Mobility in India	Go-To Webinar platform	7th October 2020	56
16	Webinar	Webinar on Facilitating Eco-Niwas Samhita Implementation in Affordable Housing	Go-To Webinar platform	28 October 2020	99
17	Webinar	Webinar: Consumer understanding of cooling appliances energy efficiency	Go-To Webinar platform	5 November 2020	97
18	Webinar	Webinar on 'Actions towards a billion-dollar ESCO market'	Go-To Webinar platform	5 November 2020	82
19	Webinar	Webinar: Policy landscape and the Industry initiatives for efficient space cooling appliances	Go-To Webinar platform	11 November 2020	73
20	Training	Online CMVP training and Exam	Zoom meeting	10-12th Dec 2020	23
21	Webinar	On Decarbonising Building Construction in India	Go-to-webinar platform	17th February 2021	112
22	Webinar	Exclusive Session: Overview of Biden-Harris Administration's Focus on Climate and Energy Policy	Zoom Meeting	10th March 2021	40
23	Roundtable Discussion	Roundtable on Green Vehicle Rating (GVR) India's only vehicle rating system based on the environmental performance of vehicles	Zoom Meeting	18th and 23rd March 2021	10

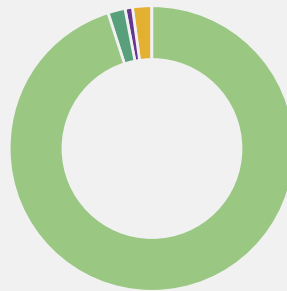
OPERATIONS & FINANCIALS

Income break up



- 71% Grants
- 20% Local contributions
- 3% CMVP Training, Certification & Renewal
- 2% Membership Fees (New/Renewal)
- 4% Other Income

Expense break up

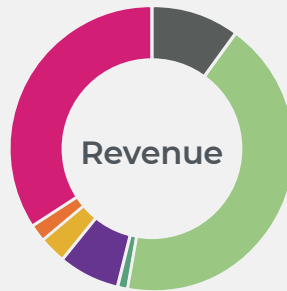


- 95% Projects
- 2% CMVP Training & Certification Expenses
- 1% Administrative Expenses
- 2% Depreciation

Thematic revenue break up

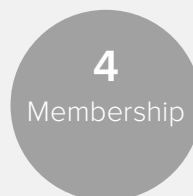


- 16% SLA
- 43% B&C
- 1% IEE
- 7% PUEM
- 5% Training
- 27% Others



- 10% SLA
- 43% B&C
- 1% IEE
- 7% PUEM
- 3% Training
- 2% Membership
- 34% Others

Top 5 sources for AEEE's funding in 2020-21



Financial Statements

ALLIANCE FOR AN ENERGY EFFICIENT ECONOMY						
BALANCE SHEET AS AT 31ST MARCH 2021						
LIABILITIES	Note	As at 31 March 2021 (In Rs.)	As at 31 March 2020 (In Rs.)	ASSETS	Note	As at 31 March 2021 (In Rs.)
Corpus Fund	1	2,29,55,517	2,29,55,517	Properties, Plant and Equipment	6	1,07,08,483
Capital Grant Reserve	2	1,07,84,603	1,07,08,483	Project Related		5,81,076
Current Liabilities and Provisions	3	96,47,609		Others		1,12,83,559
Expenses Payables and Provisions	4	25,86,366		Investments	7	92,99,436
Outlets and Taxes	5	7,02,58,505		Current Assets		
Grant Balances				Interest Accrued on FDR		76,470
Membership fees received in advance				Cash & Bank Balances	8	9,63,18,736
Project Advance from QIZ				Other Current Assets		
Income & Expenditure Account				Prepaid Expenses	9	3,62,545
Opening balance		13,58,000	11,75,002	TDS Receivable	10	7,02,150
Add: Excess of Income over		44,44,000		Income Receivable	11	43,00,015
Expenditure of Current Year				Other Current Assets		34,67,906
Less: Transferred to Corpus Fund				Total		13,30,55,924
						10,38,08,318
Total		13,30,55,924	10,38,08,318			10,38,08,318

For Alliance for An Energy Efficient Economy

As per our report of even date
For Singh K V Gupta & Co
Chartered Accountants (FRN 000133N)



CA Rakesh K Agarwal
(Partner)
M. No. 085988

Place: New Delhi
Date: 19th Aug 2021

Satish Kumar.
(Secretary)

(Chairman)
Chairperson
Executive Council
Alliance For an Energy Efficient Economy

Satish Kumar
Secretary
Alliance For an Energy Efficient Economy

Financial Statements

ALLIANCE FOR AN ENERGY EFFICIENT ECONOMY				
INCOME AND EXPENDITURE ACCOUNT FOR THE YEAR ENDED 31ST MARCH 2021				
	As at 31 March 2021 (in Rs.)	As at 31 March 2020 (in Rs.)	INCOME	As at 31 March 2020 (in Rs.)
FCRA Project Related Expenditure				
MacArthur Foundation	3,46,95,063	3,51,16,327	Grant Received (MacArthur Foundation)	3,51,16,327
Good Energies Foundation	43,20,847	1,40,52,251	Grant Received (Good Energies Foundation)	1,40,52,251
Oak Core Grant	-	48,19,010	Grant Received (Oak Core Grant)	48,19,010
ESCO Market II	-	4,84,415	Grant Received (ESCO Market)	4,84,415
Space Cooling 2	-	6,01,648	Grant Received (Space Cooling 2)	6,01,648
Support in Building Capacity of Partner Org.	1,00,79,553	45,11,633	Grant Received (Support in Building Capacity of Partner Org.)	1,59,00,000
Electric Vehicle	30,88,256	67,10,885	Grant Received (Electric Vehicle)	67,10,885
Green Vehicle Rating- II	41,61,150	1,53,434	Grant Received (Green Vehicle Rating- II)	1,53,434
GBPN	20,07,395	22,15,842	Grant Received (GBPN)	22,15,842
CICF	1,60,80,051	3,32,640	Grant Received (CICF)	1,60,80,051
New Venture Fund	1,12,935	-	Grant Received (New Venture Fund)	1,12,935
SSBF- NMHS	7,25,700	-	Grant Received (SSBF- NMHS)	7,25,700
Climate Imperative Foundation - ICEP	43,85,745	-	Grant Received (Climate Imperative Foundation - ICEP)	43,85,745
Non-FCRA Project Related Direct Expenditure				
Project Expenditure- American Council for an Energy Efficient Economy	-	16,87,618	Project - American Council for an Energy Efficient Economy	23,32,246
Project Expenditure - GIZ	29,99,221	-	Project - GIZ	23,31,387
Project Expenditure -GIZ- Department of Science & Technology	26,13,478	56,59,296	Project Grant -GIZ- Department of Science & Technology	56,59,296
Project Expenditure- National Mission on Himalayan Studies	57,44,511	24,70,032	Project Grant- National Mission on Himalayan Studies	24,70,032
CNVP Training & Certification Expenses	21,32,464	17,80,294	CNVP Training, Certification & Renewal	31,97,833
Project Expenditure-United Nation Environment Programme	27,18,009	-	Project Grant- United Nation Environment Programme	-
Project Expenditure- Indo German Energy Forum	31,162	-	Project - Indo German Energy Forum	6,14,000
Project Expenditure- Ministry of Environment, Forest and Climate Change	3,13,365	-	Project Grant- Ministry of Environment, Forest and Climate Change	8,50,000
Project - World Bank Group	-	64,02,100	Project - World Bank Group	-
Energise 2000	-	6,000	Sponsorship / Other Receipts - Energise 2000	-
Other Overheads			Membership Fees (New / Renewal)	14,67,002
Depreciation	21,80,364	21,37,759	Bank Interest Received	9,59,940
Administrative Expenses	6,35,782	2,79,269	Interest Received on FDR	4,00,400
Loss on Sale/Disposal of Fixed Assets	-	17,01,123	Interest on FDR Refund	20,345
Excess of Income over Expenditure	(16,58,217)	1,40,31,519	Misc. Income	-
			Transfer from Capital Grant Reserve	20,20,996
Total	9,73,76,815	11,07,52,875	Total	9,73,76,815
				11,07,52,875

For Alliance for An Energy Efficient Economy

As per our report of even date
For Singh K V Gupta & Co

Chartered Accountants (Firm No. 000133IN)

CA Rakesh K. Agarwal
(Partner)
M. No. 082968

Place: New Delhi

Date: 19/11/2021

(Secretary)

Satish Kumar
Secretary

(Chairman)

Chairperson
Executive Council
Alliance For an Energy Efficient Economy

Financial Statements

ALLIANCE FOR AN ENERGY EFFICIENT ECONOMY CONSOLIDATED RECEIPT & PAYMENT ACCOUNT FOR THE YEAR ENDED 31ST MARCH, 2021				
RECEIPTS	As at 31 March 2021 (in Rs.)	As at 31 March 2020 (in Rs.)	PAYMENTS	As at 31 March 2020 (in Rs.)
Operating Cash & Bank Balances	7,42,93,538	7,14,16,691		
ICRA Projects Receipts			ICRA Projects Related Payments	
Grant Received (MacArthur Foundation)	3,57,27,500	3,67,61,250	MacArthur Foundation	3,55,94,778
Grant Received (Good Energies Foundation)	1,70,35,000	-	Good Energies Foundation	46,59,830
Oak Core Grant	-	-	Oak Core Grant	-
ESCO Market II	-	-	ESCO Market II	6,27,935
Spice Cooling 2	-	-	Spice Cooling 2	7,71,934
Grant Received (Support in Building Capacity of Partner Org.)	-	1,30,00,000	Support in Building Capacity of Partner Org.	39,20,811
Grant Received (Electric Vehicle)	-	52,58,321	Electric Vehicle	32,68,649
Grant Received (Green Vehicle Rating- II)	7,77,788	61,16,602	Green Vehicle Rating- II	1,41,582
Grant Received (GMPH)	1,79,018	81,37,231	GMPH	17,87,896
Grant Received (CIFI)	3,24,92,093	-	CIFI	1,47,34,252
Grant Received (New Venture Fund)	1,01,23,600	-	New Venture Fund	2,812
Grant Received (NHHHS)	14,37,290	-	NHHHS	7,25,700
Grant Received (Climate Imperative Foundation - CIEP)	43,85,745	-	Climate Imperative Foundation - CIEP	43,85,745
NON-ICRA Direct Receipts			NON-ICRA Project Related Direct Payments	
ACIIE	9,01,465	27,16,271	ACIIE	56,39,256
World Bank Group	25,83,550	35,74,886	World Bank Group	43,87,822
Department of Science & Technology	20,00,000	2,11,168	Department of Science & Technology	53,38,104
National Mission on Himalayan Studies	0	77,81,016	National Mission on Himalayan Studies	35,39,494
CMRFP Training, Certification & Renewal Fees	29,32,605	81,97,833	CMRFP Training & Certification Expenses	45,06,085
Sponsorship / Other Receipts - Energreen 2020	6,03,000	51,18,665	Administrative Expenses	27,18,851
Membership Fees (New / Renewal) Received	30,81,750	6,58,000	Energreen 2020	3,57,792
Project - Ministry of Environment, Forest and Climate Change	8,52,000	-	Ministry of Environment, Forest and Climate Change	2,84,371
Project - India German Energy Forum	6,14,000	-	Project - India German Energy Forum	13,162
Other Receipts	19,63,091	16,34,365	Project - GIZ	22,30,660
Project - United Nation Environment Programme	-	-	United Nation Environment Programme	27,14,409
Other Receipts			Other Payments	
Interest Received on FDR	6,17,200	4,64,023	Fixed Assets purchased during the year	3,75,607
Interest on IT Refund	23,345	64,054	Unutilized Grant Refunded to Shakti Foundation	-
Misc. Income	-	3,339	Security Deposit for Office	1,35,096
Bank Interest Received	35,08,597	19,41,596	Security Deposit on CCO Machine	-
Membership Fees Received	-	1,00,000	TDS deposited	21,25,011
Fixed Assets sold during the year	-	1,70,500	Investment in Bank FDRs	14,63,712
Corpus Fund received during the year	-	1,50,000	TDS on Bank FDR Interest Income/ Other Income	30,20,178
TDS Collected and unpaid as at year end	21,73,132	21,56,181	GST Paid	4,11,425
GST Project advance	44,44,000	-	Project Advance to Vendors	17,780
Refund of Office Security Deposit	-	3,50,000	Closing Cash & Bank Balances	-
Income Tax Refund received during the year	2,80,715	7,82,664		
Total	10,00,14,052	17,27,72,348	Total	18,71,71,878

For Alliance for An Energy Efficient Economy

As per our report of even date
For Singh K V Gupta & Co
Chartered Accountants (FIRN 0001183N)

Ca Rakesh K Aggarwal
(Partner)
M. No. 085008

Satish Kumar
(Secretary)

(Chairman)

Satish Kumar
Secretary
Alliance For an Energy Efficient Economy

Satish Kumar
Chairperson
Executive Council
Alliance For an Energy Efficient Economy

Place: New Delhi
Date: 19th Aug 2021



Contact Us

📍 37 Link Road, Ground Floor
Lajpat Nagar III, New Delhi, 110 024

☎ +91-11-41235600

✉ info@aeee.in

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