

ENERGY & POWER

Rooftop Solar A Race Against Summer

- ❑ Gas crisis leads to new initiatives
- ❑ IDCOL Targets 4,800MW Solar Capacity By 2030
- ❑ Bangladesh Gas Supply Chain: Challenges and Prospect

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EDITORIAL

Bangladesh's decision to accelerate rooftop solar deployment is a welcome response to mounting pressure on the power system. With load-shedding disrupting industry and daily life and imported fuel costs adding to economic pressure, reducing dependence on grid electricity has become increasingly important. The government's target of adding 3,000–4,000MW of rooftop solar before next summer is ambitious. The new incentive package and tax concessions could provide much-needed momentum, particularly by encouraging residential consumers, businesses and local entrepreneurs to invest in solar systems with battery storage. But setting an ambitious target is easier than delivering it. The failure of an earlier six-month program targeting 3,000MW demonstrates the difficulties involved. The latest program's short eligibility period could make those challenges even more difficult to overcome. The concerns raised by industry stakeholders and energy experts therefore deserve serious consideration. If the proposed generation cost does not reflect actual project economics, the incentive may fail to attract sufficient investment. Similarly, a short-term surplus-power purchase arrangement may not provide investors with the certainty needed to commit capital to projects with long payback periods. The government should treat the current package as a starting point rather than a finished solution. A longer implementation window, predictable and dynamic tariffs, easier financing and time-bound approvals could significantly improve its effectiveness.

Rooftop solar can help ease summer peak demand while contributing to Bangladesh's longer-term energy transition. But the priority should be not merely to announce thousands of megawatts, but to ensure that the announced capacity actually reaches rooftops.

h i g h l i g h t s

COVER



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IDCOL will begin field-level activities this month under its Distributed Rooftop Solar (DRS) program, targeting at least 500MW of new capacity by next February. At the same time, the ongoing rooftop solar program is expected to add another 500MW of rooftop solar capacity in the industrial sector. Overall, IDCOL aims to facilitate the development of 4,800MW of solar capacity... S.M. Monirul Islam tells EP



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The vast majority of the estimated 4-6 million three-wheelers run on lead-acid battery packs, which are typically 48-volt or 60-volt systems. Emerging options and modern upgrades utilize lithium-ion packs offering a longer lifespan and faster charging times. However, lithium-ion options represent a smaller market share due to high price..... More In Article



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Bangladesh is stepping up efforts to expand rooftop solar as worsening power shortages, rising fuel costs and pressure on foreign exchange reserves expose the vulnerability of its energy system. With load shedding reaching around 3,800MW during the current summer, the government is seeking to expand rooftop solar capacity before next summer through incentives, tax concessions and new financing models.



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Encouraged by the readers and patrons, the EP would continue bringing out Green Pages to contribute to the country's efforts in its journey towards climate-friendly energy.

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US Diesel Price Hits Record \$5.90 a Gallon: AAA



The average price of diesel in the United States reached a record \$5.90 per gallon on September 7, according to the American Automobile Association (AAA), as supply disruptions linked to the conflict with Iran pushed fuel prices higher.

The price was about 30 cents higher than a week earlier and significantly above the \$3.71 average recorded a year ago. Rising diesel costs are putting pressure on trucking,

agriculture and construction, with businesses potentially passing higher transport costs on to consumers.

The national average for regular gasoline also climbed to around \$4.15 a gallon on September 7, up from about \$3.20 a year earlier.

Meanwhile, US diesel prices continued to rise, surpassing \$6 a gallon nationally by September 10, according to GasBuddy.

Ventura Offshore Wins \$58m PETRONAS Drilling Contract in Indonesia



Ventura Offshore has secured a \$58 million drilling contract from PETRONAS E&P Bobara for a one-well campaign offshore Indonesia.

The contract will involve the ultra-deepwater drillship Deep Value Driller, which Ventura will market and operate under a new agreement with Eldorado Drilling, the vessel's owner.

The drilling campaign

highlights renewed offshore exploration activity in Southeast Asia, where operators are advancing oil and gas projects to strengthen regional energy supplies.

The marketing and operations agreement also expands Ventura Offshore's managed fleet and provides the company with opportunities to pursue additional ultra-deepwater drilling projects beyond the initial PETRONAS campaign.

New Jack-Up Vessel Targets Next-Generation Offshore Wind Turbines



Deltamarin and Offshoretronic have unveiled the VITRUVIAN Class, a new jack-up installation vessel concept designed to handle monopile foundations weighing up to 5,000 metric tonnes for next-generation offshore wind turbines.

The companies signed an exclusive engineering agreement at SMM 2026 in Hamburg to develop the vessel to shipyard-ready status. The design targets 20–30 MW turbines expected to enter commercial service by around 2030 and operate in

water depths of 30–60 meters.

The 179-meter-long, 75-meter-wide vessel will be capable of handling monopiles up to 130 meters long and 16 meters in diameter.

The companies said the capability exceeds the typical 3,000–3,500-tonne limit of the current installation fleet.

A Wind Turbine Installation Vessel variant is also planned to transport and install major 20–30 MW turbine components, including towers, nacelles and blades.

bp Welcomes Shell into Exploration Prospects in Brazil, Gulf of America

bp and Shell have agreed terms for Shell to acquire a 50% stake in the Tupinambá exploration block in the Santos Basin, offshore Brazil, in addition to a 30% stake in five leases containing the Conifer exploration prospect in the deepwater Gulf of America Paleogene.

The transactions support bp's disciplined approach to capital allocation in service of becoming a simpler, stronger, more valuable company.

bp will retain the remaining 50% interest in Tupinambá and 70% in Conifer and continue as operator in both.

Gordon Birrell, EVP



Upstream, said: "Brazil and the Gulf of America are important regions for bp, and bringing together two experienced operators can help unlock the potential of both opportunities.

This collaboration will help strengthen our position in both as we progress exploration activity." Completion of Tupinambá remains subject to regulatory approvals.

Fresh LP Gas Expands LPG Fleet to Boost Nationwide Supply

Fresh LP Gas, a concern of Meghna Group of Industries (MGI), has added a 2,000-metric-tonne LPG carrier to its fleet to



strengthen transportation capacity and ensure reliable supplies across Bangladesh.

Meghnaghat and Mongla plants, supporting a more reliable supply network.

The new vessel, MT Mercantile-65, brings the company's dedicated LPG carrier fleet to three, with a combined capacity of 6,000 metric tonnes.

MGI Director Tanveer Mostafa said the company would continue investing in transportation and logistics to meet rising LPG demand. Fresh LP Gas CMO Abu Sayed Raza said the expanded fleet would help maintain year-round supply and extend LPG access to underserved areas.

The vessels will transport imported LPG from the Kutubdia and Chattogram anchorages to Fresh LP Gas's

Bangladesh to Buy 18 More LNG Cargoes from TotalEnergies

Bangladesh has approved the direct purchase of 18 additional LNG cargoes from TotalEnergies to meet urgent gas demand amid



shrinking supplies and disruptions caused by the conflict in West Asia.

approved 22 LNG cargoes through direct purchases in August as gas shortages intensified.

The Economic Affairs Cabinet Committee approved the purchase of two cargoes a month from October through June, without a tender. It also gave in-principle approval for additional purchases from TotalEnergies if required, subject to mutual agreement.

The government also approved proposals to purchase diesel, jet fuel and furnace oil from international suppliers including Trafigura, Vitol Asia and Unipet for September-December, with the combined proposed value running into tens of billions of taka.

The government had earlier

Fire Damages Server, Documents at Rooppur Plant Office

A fire at a temporary Bangladesh Atomic Energy Commission (BAEC) office inside the Rooppur Nuclear Power Plant premises in Pabna damaged an internal server, documents and IT equipment, officials said.



The fire broke out at a building near Gate No. 2 recently and was brought under control by fire service personnel. No one was injured. The incident disrupted internal internet services temporarily.

Officials said the affected documents have backup copies and the fire occurred

outside the plant's main facilities, so construction and commissioning activities remain unaffected.

A preliminary assessment suggested an electrical fault in an air-conditioning unit may have caused the fire. An investigation committee has been formed to determine the exact cause and assess the damage.

Singapore-based Trafigura, Vitol Offer to Supply Fuel Oil to Bangladesh in Sept-Dec

Singapore-based energy traders Trafigura Pte Ltd and Vitol Asia Pte Ltd have submitted offers to supply fuel oil to Bangladesh between September and December under an international competitive tender.



The Cabinet Committee on Government Purchase, at a meeting chaired by Finance Minister Amir Khosru Mahmud Chowdhury on 9 September, directed officials to negotiate with the two companies on premiums and reference prices and place the revised offers before the committee at its next meeting.

According to the proposals placed before the committee, Trafigura has offered to supply 220,000-250,000 tonnes of diesel and 50,000 tonnes of Jet A-1 fuel at a proposed total cost of Tk4,803 crore.

Vitol Asia, meanwhile, has offered to supply 200,000-230,000 tonnes of diesel and 40,000 tonnes of Jet A-1 at a proposed cost of Tk4,326 crore.



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Dr Rafiqul Islam Appointed New BPC Chairman

Additional Secretary Dr Rafiqul Islam has been appointed Chairman of the Bangladesh Petroleum Corporation (BPC), replacing the vacant position that remained unfilled for nearly two months.



An order appointing Dr Rafiqul Islam as BPC Chairman was issued on September 6.

Bangladesh Energy and Power Research Council.

Before the appointment, Dr Rafiqul Islam served as a member of the

The position became vacant after BPC Chairman Engineer Rezanur Rahman was removed from his post nearly two months ago.

Abdul Mannan Appointed Petrobangla Chairman

Additional Secretary Md Abdul Mannan has been appointed as the full-fledged chairman of Petrobangla, ending a vacancy of around three and a half months.



Mannan had been serving as the additional secretary while also holding the Petrobangla chairman's post in an additional capacity.

Petrobangla now has a permanent head.

The chairman's position had remained vacant for nearly three and a half months, drawing criticism over the delay in appointing a full-time chairman. With the latest appointment,

Md Abdul Mannan will oversee the state-owned oil, gas and mineral resources corporation at a time when Bangladesh's energy sector is facing significant challenges.

Ecolet to Invest \$15.9m in LED Plant at BEPZA Economic Zone

Bangladeshi company Ecolet (Pvt.) Ltd will invest US\$15.91 million to establish an LED products manufacturing plant at the BEPZA Economic Zone in Mirsharai, Chattogram.



The company will produce around 6 million LED bulbs, lamps and decorative lights annually for export to the United States, United Kingdom, European Union and Middle Eastern markets. The project is expected to create jobs for 306 Bangladeshi nationals.

(Investment Promotion) of BEPZA, and Ecolet Managing Director Mohammad Soliman signed the agreement.

BEPZA Executive Chairman Major General Mohammad Moazzem Hossain said the investment would support the authority's efforts to diversify Bangladesh's export basket by promoting technology-oriented electrical and electronics manufacturing alongside traditional export sectors.

An agreement was signed between the Bangladesh Export Processing Zones Authority (BEPZA) and Ecolet on August 27 in Dhaka. Md Tanvir Hossain, Member

ADB Backs \$175m Power Grid Upgrade in Bangladesh's Hill Tracts

The Asian Development Bank (ADB) has approved a \$175 million concessional loan to expand reliable and affordable electricity access in Bangladesh's Chattogram Hill Tracts, with the project expected to connect at least 88,000 additional households by 2032.

Rangamati and Bandarban.

It includes six new 33/11 kV substations, 5,032 km of new distribution lines and upgrades to 1,874 km of existing lines. The improvements are expected to reduce system losses, strengthen grid resilience and avoid at least 19,300 tonnes of CO₂-equivalent emissions annually.

The Sustainable Energy Development and Community Empowerment Project will modernize distribution networks across 26 remote upazilas in Khagrachari,

Grid access in the three hill districts remains well below Bangladesh's national electrification rate.

Chattogram Waste-to-Energy PPP Project Gets Nod

The Cabinet Committee on Economic Affairs (CCEA) on September 9 gave in-principle approval to a proposal for implementing a Waste-to-Energy power generation project in the Chattogram City Corporation area on a Public-Private Partnership (PPP) basis.



The approvals were given at the CCEA meeting held at the Cabinet Division in the city with

Finance Minister Amir Khosru Mahmud Chowdhury in the chair. The proposal was submitted by the Local Government Division.

Chattogram, the country's second-largest city and a major commercial and industrial hub, generates a substantial volume of municipal solid waste every day.

Rooftop Solar A Race Against Summer

Mollah Amzad Hossain



Bangladesh has launched a package of incentives, tax concessions and financing initiatives to accelerate rooftop solar deployment ahead of next summer, amid severe power shortages and rising fuel costs. The government targets 3,000–4,000MW, with IDCOL aiming to facilitate 1,000MW through residential and industrial programs. However, industry stakeholders and energy experts question the generation-cost assumptions and tight implementation deadline. They have called for longer project timelines, improved financing, streamlined approvals, and more attractive, dynamic tariffs for surplus electricity.





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Bangladesh's Rooftop Solar Mission

The government is launching an aggressive rooftop solar mission with financial incentives to stabilize the grid, bridging the severe national energy shortfall.



STRATEGIC TARGETS & FINANCIAL INCENTIVES

4,000MW Capacity Goal

The government aims to add 3,000–4,000MW of rooftop solar before next summer.



Duty-Free Equipment Imports

Tax and duty concessions are approved for solar panels, batteries, and inverters.



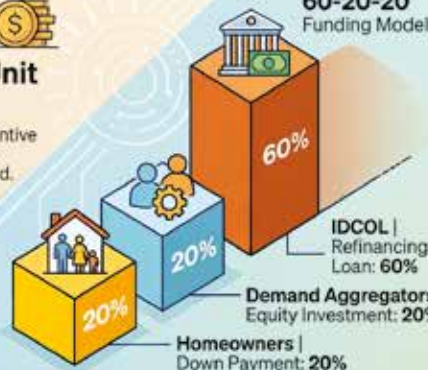
Tk 10.50 per Unit Surplus Tariff

Customers receive an incentive tariff for surplus electricity supplied to the national grid.

FINANCING MODEL & IMPLEMENTATION



IDCOL's 60-20-20 Funding Model



February 2027 Installation Deadline

Systems must be installed by this date to qualify for the incentive package.



Local Entrepreneur Empowerment

District-level service providers will manage technical assistance and maintenance across the nation.

AI-Assisted Infograph

Prime Minister Tarique Rahman has apologized to the people for the continuing power shortages. At the same time, the government has begun preparations to meet next summer's electricity demand.

Bangladesh is stepping up efforts to expand rooftop solar as worsening power shortages, rising fuel costs and pressure on foreign exchange reserves expose the vulnerability of its energy system. With load shedding reaching around 3,800MW during the current summer, the government is seeking to add thousands of megawatts of rooftop solar capacity before next summer through incentives, tax concessions and new financing models.

The initiative has generated considerable interest, particularly in the industrial sector, but stakeholders remain concerned about whether the ambitious targets can be achieved within the proposed timeframe. Financing, equipment supply, approvals, net-metering arrangements and the economics of battery storage could determine whether the government's plans translate into actual capacity.

Bangladesh is under growing pressure over energy supply. The situation has been aggravated by supply shortages and rising fuel costs, while the conflict in the Middle East has further increased energy expenditure and put additional pressure on foreign exchange reserves. Although load shedding has remained

relatively manageable in the capital and major cities, it has become severe in rural areas. Reports have emerged that some regions are experiencing power outages for nearly half of the day. The crisis is disrupting industrial production, business activities, and daily life, while also increasing diesel consumption.

Prime Minister Tarique Rahman has apologized to the people for the continuing power shortages. At the same time, the government has begun preparations to meet next summer's electricity demand.

At a meeting with business leaders on September 14, the Prime Minister said gas and electricity supplies would return to the levels prevailing before the crisis that emerged in July from the night of September 15. The government also presented plans to expand renewable energy, increase coal and gas exploration, and strengthen import infrastructure.

Alongside efforts to ensure adequate primary fuel for power generation, the government has introduced a special package, including duty-free facilities, to accelerate rooftop solar installations, particularly in the residential sector. The aim is to achieve significant rooftop

solar capacity before February next year.

State Minister for Power, Energy and Mineral Resources Aninda Islam Amit told Parliament that the government wanted to add at least 3,000MW of rooftop solar capacity before next summer. The Power Division, meanwhile, is working with an even higher target of 4,000MW.

Special Incentive for Rooftop Solar with Battery Storage

The government has introduced a special incentive package to accelerate the installation of rooftop solar systems with battery storage as part of its efforts to expand renewable energy and strengthen long-term energy security.

Under a government notification issued on September 1, the maximum generation cost for rooftop solar systems with battery storage has been set at Tk 8 per unit. After adding a 20% profit margin and an 11.25% premium, the incentive tariff for surplus electricity supplied to the grid has been fixed at Tk 10.50 per unit.

Under the Net Metering Guideline 2025, customers installing storage-integrated rooftop solar systems by February 28, 2027, can receive Tk 10.50 per unit for surplus electricity supplied to the national grid after meeting their own demand. The incentive will remain available for three years, until February 28, 2030.

If customers install systems at a cost below the government's benchmark, the savings will accrue to them. Distribution companies will maintain records of participating customers, electricity supplied to the grid and payments, including the incentive. The incentive will be paid directly into customers' bank accounts or mobile financial service accounts; cash payments will not be allowed. Systems installed after February 28, 2027, will not qualify for the incentive.

All equipment, including solar panels, batteries, inverters and meters, must meet the technical standards set by the relevant authorities, including BSTI and SREDA. Assistance will be available through the Power Division's one-stop service center and district- and upazila-level offices of distribution companies.

The Power Division expects the initiative to make rooftop solar an important component of Bangladesh's energy transition while creating new opportunities for local investment, skills development, small and medium-sized businesses and employment.

Tax and Duty Concessions for Solar Equipment

The government has also approved tax and duty concessions on the import of equipment and machinery required for renewable solar power projects.

Under the approved proposal, imports made within six months of the issuance of the relevant notification will be exempt from customs duty, regulatory duty, supplementary duty, VAT, advance tax and advance income tax above the applicable 1% threshold.

The government expects the facility to boost solar power generation, reduce pressure caused by electricity shortages

and support uninterrupted industrial production. It is also expected to lower project costs, reduce losses associated with imported equipment and encourage investment and economic activity in the solar sector.

Local Entrepreneurs to Drive Rooftop Solar Expansion

The government has also launched an initiative to expand rooftop solar through local entrepreneurs and build a nationwide network of renewable energy service providers.

Qualified service providers will be enlisted on a district and geographic-area basis. They will provide technical assistance, investment and business packages, customer services, and operation and maintenance facilities for rooftop solar and other renewable-energy technologies.

All electricity distribution companies have invited applications for enlistment. Individuals and joint ventures will be eligible to participate. The initiative is expected to create opportunities for local businesses, small and medium-sized enterprises, young and women entrepreneurs, and technology-based companies to enter the renewable energy sector. Increased competition could also lead to more affordable and innovative investment and service packages for consumers.

The Power Division expects the initiative to make rooftop solar an important component of Bangladesh's energy transition while creating new opportunities for local investment, skills development, small and medium-sized businesses and employment.

IDCOL Targets 1,000MW

Infrastructure Development Company Limited (IDCOL) is working to facilitate 1,000MW of solar capacity before next summer. The state-owned specialized financial institution aims to contribute one-fourth of the government's broader target of 4,000MW of renewable energy capacity by next summer.

Of the IDCOL target, 500MW is planned under a new Domestic Rooftop Solar (DRS) program, while another 500MW is expected from expansion of its existing industrial rooftop solar program.

The DRS initiative is expected to be launched shortly.

IDCOL Managing Director (Acting) SM Monirul Islam said homeowners would provide 20% of the system cost as a down payment, while demand aggregators (DAs) would contribute another 20% as equity. IDCOL would refinance the remaining 60% through loans to the DAs.

Under the model, homeowners would repay their financing over five years and DAs over seven years. The model is intended to make rooftop solar more affordable while reducing dependence on grid electricity.

Can the Target Be Achieved Before Summer?

The government's rooftop solar initiative comes at a critical time. Bangladesh needs to reduce pressure on the grid while also containing the rising cost of imported fossil fuels. Rooftop solar, particularly when combined with battery storage, can help reduce daytime grid demand and provide backup power during outages.

However, the target of adding 3,000–4,000MW before next summer is highly ambitious. Project approvals, financing, equipment supply, technical standards, installation capacity, and net-metering procedures could all affect the pace of implementation.

The experience of an earlier six-month rooftop solar program targeting 3,000MW also suggests that ambitious capacity targets alone may not be sufficient. A longer implementation window, easier access to financing, streamlined approvals and a more attractive and predictable surplus-power purchase mechanism may be necessary.

The government's initiative to use rooftop solar to ease pressure on the grid before summer is therefore a welcome step. But to turn the target into actual capacity, the incentive package and implementation framework may need further review in consultation with investors, entrepreneurs, equipment suppliers, distribution companies and energy experts.

If these bottlenecks can be addressed

The target of adding 3,000–4,000MW before next summer is highly ambitious. Project approvals, financing, equipment supply, technical standards, installation capacity, and net-metering procedures could all affect the pace of implementation.

quickly, rooftop solar could become not only a short-term tool for reducing summer load pressure but also an important pillar of Bangladesh's longer-term energy transition.

Under the proposed model, homeowners will repay their share of the financing over five years, while demand aggregators (DAs) will repay their loans over seven years. The effective cost of electricity for households could be Tk 6–8 per unit, significantly lower than the prevailing electricity tariff.

SM Monirul Islam said the Domestic Rooftop Solar (DRS) program could potentially unlock around 33,000MW of

rooftop solar capacity in the long term if market players participate on a large scale. However, several issues, including the selection of DAs, equipment standards, and supply-chain readiness, need to be addressed before the program is rolled out nationwide.

IDCOL plans to deploy the selected DAs in the field within the next two weeks. Initially, it is selecting DAs from organizations that previously worked as partner organizations under its Solar Home Systems program and have a good track record, including satisfactory financial records and no loan defaults. The number of DAs will later be expanded to include private-sector companies and new entrepreneurs.

BSREA Seeks Review of Solar Package

The Bangladesh Sustainable and Renewable Energy Association (BSREA) has welcomed the government's initiative to expand rooftop solar but has proposed a seven-point set of recommendations to make the incentive package more effective.

The association has called for a realistic assessment of project costs, taking into account system size, technology, financing, operation and maintenance expenses, particularly battery-storage costs. Based on such an assessment, it has proposed setting the generation cost at around Tk 8 per unit.

BSREA has also recommended reviewing the existing Tk 10.50 per-unit tariff for purchasing surplus electricity and introducing a dynamic or indexed tariff linked to changes in the bulk electricity tariff. It has further proposed extending the electricity purchase period from three years to five to 10 years, or an appropriate period. The association has also suggested providing collateral-free financing at an interest rate of 3–4% for rooftop solar projects.

To speed up project implementation, BSREA has recommended time-bound approvals, with SREDA and BSTI approvals completed within 10 working days and net-metering approvals from distribution companies within seven working days.

It has also proposed establishing a

one-stop service and a central digital monitoring system to ensure smooth implementation of the entire program.

BSREA Secretary General Engineer Ataur Rahman Rozel said adding 4,000MW of rooftop solar capacity before next summer would be extremely challenging. He also expressed concern that IDCOL's proposed approach could remain largely dependent on NGOs. The government, he said, must ensure access to financing for private entrepreneurs and individuals interested in installing rooftop solar systems.

"Even then, I do not think the target can be achieved within the next five months," Rozel said. However, he noted that residential and commercial consumers could become increasingly interested in rooftop solar once load shedding intensifies during the summer.

Institute for Energy Economics and Financial Analysis (IEEFA) Lead Energy Analyst Engineer Shafiqul Alam also said the target of adding 4,000MW of rooftop solar before next summer was unrealistic.

He pointed out that a previous program announced in 2025 aimed to add 3,000MW of rooftop solar capacity within six months, but failed to implement any projects under the program.

Under the latest package, projects are eligible for the incentive only until February next year. Alam suggested extending the implementation window to at least one year.

He also called for changes to the surplus electricity purchase mechanism. Instead of limiting the Tk 10.50 per-unit

throughout the lifetime of the project.

A Promising Initiative That Needs Fine-Tuning

A quiet rooftop solar revolution is already underway in Bangladesh, particularly in the industrial sector. Around 1,500MW of rooftop solar capacity has reportedly been added so far, while interest in combining rooftop solar with battery storage is growing.

Although Bangladesh has adopted several plans to expand renewable energy, the sector has rarely received meaningful financial incentives. The latest package marks a significant step by providing incentives for rooftop solar systems with storage.

However, stakeholders believe the package needs to be revisited, particularly regarding its implementation period, electricity purchase tariff, and duration of the purchase arrangement.

Similar incentive programs have achieved success in countries such as Vietnam, where the electricity purchase arrangement was kept open for a longer period.

The government has also recently announced tax and duty concessions for rooftop solar equipment for six months. Industry stakeholders have called for extending this period to at least one year.

In 2025, Bangladesh announced a program to add 3,000MW of rooftop solar capacity within six months, but no projects could be implemented under the initiative. The latest storage-integrated rooftop solar program also has a six-month implementation window.

Sector stakeholders argue that Bangladesh's lengthy project approval process and bureaucratic complexities should allow at least one year. The government's initiative to accelerate rooftop solar deployment ahead of the summer is widely seen as a positive move. However, stakeholders believe the Power Division should revisit the program and package after consulting industry players and experts to ensure it can achieve its ambitious targets. 

In 2025, Bangladesh announced a program to add 3,000MW of rooftop solar capacity within six months, but no projects could be implemented under the initiative. The latest storage-integrated rooftop solar program also has a six-month implementation window.

Experts Question Generation Cost and Timeline

Former Bangladesh Energy Regulatory Commission (BERC) member Engineer Mizanur Rahman said the proposed tariff for purchasing surplus electricity was not sufficiently attractive.

According to his assessment, the generation cost would be around Tk 10.39 per unit for a 1kW solar system with 1kW of battery storage. If the system is paired with 0.5kW of battery storage, the generation cost would still be around Tk 9.43 per unit.

"It is difficult to understand on what basis the generation cost has been estimated at Tk 8 per unit," he said, urging the Power Division to reassess the cost.

tariff to a fixed period, he proposed that electricity exported to the grid through net metering should receive the tariff throughout the entire project lifetime.

"Despite these concerns, the incentive for rooftop solar installation is commendable," he said.

BSREA President Mostafa Al Mahmud said the government's successive initiatives to promote renewable energy were encouraging. However, he also called for a fresh review of the rooftop solar package, particularly the tariff structure.

He said the tariff should be dynamic and that the opportunity to sell surplus electricity should remain available



Saleque Sufi

Bangladesh Gas Supply Chain: Challenges and Prospect

Seven months into the new BNP-led government's term, Bangladesh's energy and power sector remains under severe strain. The country has experienced unprecedented load shedding amid shortages of primary fuel, while its proven recoverable gas reserves continue to decline. Efforts to discover major new resources may take time, and LNG imports remain constrained by inadequate infrastructure and high global prices. The disruption of supply chains following the closure of the Strait of Hormuz has added another layer of uncertainty.

The new government has inherited an energy sector burdened by shortages, rising costs and heavy debt. It has launched several initiatives to address the crisis, ranging from accelerated domestic gas exploration and LNG imports to connecting Bhola's stranded gas resources to the national grid and pursuing offshore exploration. This article critically examines these initiatives and considers what more

may be required to put the sector on a sustainable path.

Drilling of 50 and 100 Wells

The government has announced plans to revitalize the drilling initiatives of the previous regime after identifying key issues and challenges. The activities of BAPEX, SGFL and BGFL have been revitalized. One of the major challenges identified is the protracted DPP approval process, an essential nuisance. It is alleged that DPPs often take more than a year from the conceptual stage to approval. Unnecessary questions are also raised by inexperienced government officials.

The government must streamline the DPP approval process to expedite gas exploration and development initiatives, considering them top-priority national projects.

Land acquisition is also a critical activity for drilling projects. The government must assist the executing agencies



in shortening the process. A drilling project requires land development and access-road construction before the drilling rig can be mobilized and work can commence.

Our E&P company, BAPEX, and production companies, BGFL and SGFL, have achieved commendable success despite several constraints. We expect some great news to emerge soon from the successful endeavors of Petrobangla companies. Success in drilling deeper prospects at Titas, Bakhrabad and Srikail could change the scenario. Some wells drilled recently by SGFL may also add significant new resources. There is a prospect of finding oil as well.

After visiting some drill sites and interacting with technical personnel, I feel optimistic about the discovery of significant new resources soon. I would like to advise carrying out extensive 2D followed by 3D seismic surveys in the prolific Surma Basin, Block 9 and Block 7 areas. I would also suggest launching a PSC bidding round for land blocks outside BAPEX's ring-fenced areas.

If 10 exploration rigs are put into

operation by 2028, I believe it is possible to add at least 5 Tcf of new gas to recoverable reserves by 2031.

LNG Import Initiative

Bangladesh now utilizes 900–1,000 MMCFD of imported LNG through two FSRUs anchored in shallow water off Moheshkhali, Cox's Bazar. LNG imports have been stressed by the war in the Middle East and disruption to supply chains.

The interim government of Dr. M. Yunus, out of what I believe was a misplaced decision, canceled a signed contract with Summit Group for a new FSRU. If not, an additional 500 MMCFD of RLNG could have been added by the end of 2026. The Yunus government also brought several discussions on LNG imports that were at an advanced stage to an end. During the one and a half years of that government's tenure, no initiative was taken to increase LNG imports.

The new government is in the process of finalizing a contract with a Chinese company. We hope the government will clarify some controversies arising in the local media about the competence of the Chinese company. We would

suggest resolving the dispute with Summit over the third FSRU in the greater national interest. At this stage, that would be the best course of action if viewed with positive intent.

Proposals for setting up FSRUs at Khulna and Barishal appear overambitious. Plans for importing LNG in ISO tanks also appear unrealistic. Apart from launching initiatives to expand LNG import capacity through FSRUs and land-based terminals, the government has to construct the required additional gas transmission infrastructure.

The two existing gas pipelines from Moheshkhali to Anowara have a combined capacity to evacuate 1,600 MMCFD. But this would lower the pressure at the inlet of the gas grid to 500 PSI. Hence, at least one new parallel pipeline must be built by GTCL from Feni to Bakhrabad.

If acquisition of the right of way at a safe distance from the existing pipeline is launched now, along with simultaneous procurement of materials and engagement of contractors, the pipeline may be ready for operation within three years.



We do not think the government needs any additional gas-based power plants at this stage. Any new fertilizer plant would take 8–10 years. However, gas supply to Barishal and Khulna could stimulate green industrialization in the region.

Connecting Gas Fields of Bhola to National Gas Grid

It is a national failure that the gas resource discovered at Bhola remains stranded even as the nation suffers from a gas famine. We have heard with shock and awe that the Prime Minister thinks it could take up to seven years to evacuate gas from the Bhola gas fields to the national grid.

As a pipeline professional with about 50 years of proven experience, I can assure you that it should not take more than three years to connect Bhola's gas resources to the national grid by constructing a 120-km Bhola–Barishal–Khulna pipeline. Any other proposal to transport the gas by converting it to CNG or LNG would be a waste of time.

We do not think the government needs any additional gas-based power plants at this stage. Any new fertilizer plant would take 8–10 years. However, gas supply to Barishal and Khulna could stimulate green industrialization in the region.

For this to happen, the government must professionally assess the proven gas reserve by engaging an internationally accredited reservoir assessor. GTCL must engage a reputed subsea pipeline developer to design the crossings of three large rivers, along with at least three HDD contractors for the other rivers. A couple of contractors

could be tasked with constructing the land sections of the pipeline.

The existence of a gas transmission facility in the region would encourage IOCs to consider investment in Block 7 and adjoining areas.

Offshore PSC Bidding

We have observed a less-than-optimistic response so far to Petrobangla's invitation for offshore exploration. We are not sure that roadshows in Singapore, London and New York would be beneficial. We would rather suggest holding a conference in Dhaka and inviting potential bidders.

The deteriorating law-and-order situation in Bangladesh does not provide sufficient security confidence to potential investors. Some regional countries, including Thailand, Vietnam, Malaysia and Indonesia, have also announced bidding rounds. Those countries have far better records of dealing with IOCs. Still, we hope that Bangladesh will secure some investment.

Finally, I would suggest strengthening the technical and managerial capacity of Petrobangla and its companies. Many senior officials have reached retirement age. A huge void of competent officials may be created soon. The government must plan to retain some of them, as their institutional memory will be invaluable.

The government must also move away from exclusive reliance on bureaucrats for gas-system planning and management. The task of recovering from the crisis is intense but manageable if approached pragmatically.

The bottom line remains an aggressive initiative to explore and develop Bangladesh's own gas resources, both onshore and offshore. Domestic gas must contribute at least 50% of the country's gas requirements through 2040. LNG import initiatives must also be planned carefully, considering the financial stress they create. ■■

Saleque Sufi, Energy Expert, Former Director of Operations, GTCL

BREAKING
BOUNDARIES

TOUCHING THE LIVES OF
M I L L I O N S

Mgi
Meghna Group of Industries



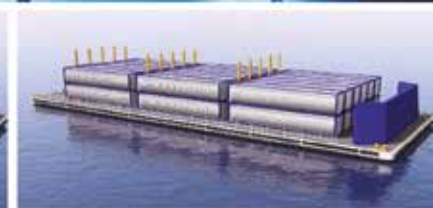
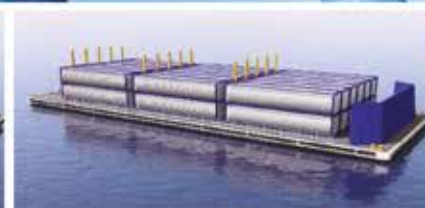
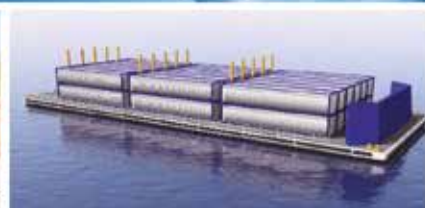
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Shipping LNG In ISO-tank And Transport By 'Virtual Gas Pipeline'

Zainul Abedin

Recent reporting indicates that Bangladesh is exploring importing LNG from Malaysia in 20- and 40-foot ISO tanks for industries, power, and fertilizer plants. The concept deserves serious consideration as a complement to Bangladesh's existing and planned FSRU and land-based LNG infrastructure.

1. EXECUTIVE SUMMARY

Bangladesh faces challenges in expanding its LNG supply due to limitations in FSRUs, offshore infrastructure, pipelines, and the country's shallow-water conditions. One possible solution is LNG transported in cryogenic ISO tank containers and distributed by a "virtual gas pipeline".

LNG can be loaded into 20- or 40-foot ISO tanks at the exporting country, shipped by conventional container vessels, and then distributed inside Bangladesh by truck, rail, or river barge. This system is often called a "virtual gas pipeline" because it can deliver natural gas to customers without constructing a continuous gas pipeline.

Recent reporting indicates that Bangladesh is exploring importing LNG from Malaysia in 20- and 40-foot ISO tanks for industries, power, and fertilizer plants. The concept deserves serious consideration as a complement to Bangladesh's existing and planned FSRU and land-based LNG infrastructure.

The ISO-tank LNG "virtual gas pipeline" is not a substitute for Bangladesh's large-scale FSRU and land-based LNG terminals. But at approximately 0.5–2 MTPA, it could become a valuable part of Bangladesh's energy strategy.

The strongest concept is therefore a Distributed LNG Network combining ISO LNG tanks + conventional container vessels + ports + river barges + rail + trucks + regional LNG hubs + small regasification plants.

Such a system could bring LNG to industrial and power customers even when an FSRU fails. The most attractive feature may not be the lowest LNG price but a combination of speed, flexibility, geographic reach, lower infrastructure requirements, and supply security.

The immediate next step should be a detailed Bangladesh feasibility study covering:

1. Actual ISO-tank capacity and specifications
2. LNG supply source and purchase price

3. Port suitability at Chattogram, Matarbari, Mongla and Payra
4. Number and type of container vessels required
5. Rail, river-barge and truck logistics
6. Regional LNG hub locations
7. Small-scale regasification technology
8. Safety and regulatory requirements
9. Delivered LNG cost in \$/MMBtu
10. A phased 0.5 MTPA → 1 MTPA → 2 MTPA development plan

Bangladesh should not try to replace or add FSRUs with ISO tanks. It should use ISO LNG to create a second, flexible “virtual gas pipeline” that complements the national LNG and gas-grid system.

2. How the System Would Work

The basic supply chain would be: LNG supplier → ISO LNG tanks → conventional container vessel → Bangladesh port → truck/rail/barge → regional LNG hub → regasification → customer

The process would be:

- LNG is loaded into certified cryogenic ISO tanks at the exporting country.
- The ISO tanks are loaded onto a conventional container or cargo vessel.
- The vessel carries the tanks to a suitable Bangladeshi port such as Chattogram, Matarbari, Mongla, or Payra.
- The containers are transferred to trucks, railway wagons, or river barges.
- They are transported to regional LNG distribution hubs.
- At the hub, LNG is transferred to storage and regasification facilities. The resulting natural gas is supplied through short local pipelines to nearby industries, power plants, fertilizer plants, or other users. ISO LNG containers can be transferred between ships, trucks, and rail, making the system particularly suitable for multimodal transportation.

3. An Important Limitation

ISO-tank LNG is not a replacement for Bangladesh’s large-scale LNG supply system. A national system requiring approximately 1,000–3,000 MMscfd

cannot realistically be supplied entirely through ISO tanks. The number of containers, ships, cranes, trucks, storage facilities, and handling operations would become enormous.

Therefore, 1 MTPA is technically manageable, while attempting to transport 5–10 MTPA in ISO tanks would create a very large logistical operation.

Approximate requirements are:

LNG supply	LNG per year	Approx. ISO tanks/year
0.1 MTPA	100,000 tonnes	4,000–7,000
0.5 MTPA	500,000 tonnes	20,000–30,000
1.0 MTPA	1 million tonnes	40,000–60,000
5.0 MTPA	5 million tonnes	200,000–300,000

These figures are approximate and depend on the actual tank capacity and LNG density.

4. The Best Approach: A Hybrid LNG System

The question should not be: “FSRU or ISO tanks?” Instead, Bangladesh should consider a hybrid LNG strategy.

Layer 1 — Bulk LNG

Use FSRUs and land-based LNG terminals for national gas-grid supply.

- Large power plants
- Major fertilizer plants
- Large industrial consumers
- Dhaka and other major demand centres

Layer 2 — Small-Scale LNG

Use ISO-tank LNG for: - Industrial clusters without adequate pipeline supply.

- Fertilizer plants and Captive power plants
- Textile factories, Ceramic and glass industries

Layer 3 — Inland “Virtual Pipeline

Use ISO tanks together with river barges, rail, and trucks to reach: Khulna – Barishal – Rajshahi – Northern Bangladesh – Southwestern Bangladesh and Remote industrial areas

Three-layer approach allows ISO LNG to complement, not compete with large LNG terminals.

5. River Barges Could Be Particularly Important

Bangladesh has an extensive inland-waterway network. Therefore, the system should not depend entirely on road transportation. Instead of: Port → Truck → Factory

A more efficient system could be: Receiving port → ISO LNG tanks → River barge → Inland LNG depot → Truck/Rail → Customer

Another possible route is: Payra → River barge/Rail → Barishal/Khulna region

Using barges could substantially reduce road congestion and transportation costs. Another important advantage, the LNG does not have to be transferred from an LNG carrier to an offshore FSRU. The LNG remains inside certified ISO tanks throughout the transportation process.

However, this does not eliminate port limitations. The receiving port must still have sufficient draft and infrastructure to handle the container vessel. The advantage is that Bangladesh would no longer require the specialized LNG-carrier/FSRU interface.

6. The Concept of a Distributed LNG Network

The most promising application for Bangladesh is therefore a Distributed LNG Network. Instead of bringing all LNG to a large terminal, LNG could be distributed among several regional hubs. For example, a 1 MTPA system could initially be divided approximately as follows:

Location	Annual LNG
Chattogram/Matarbari	400,000 tonnes
Dhaka/Narayanganj	250,000 tonnes
Khulna/Mongla	150,000 tonnes
Barishal/Payra	100,000 tonnes
Northern Bangladesh	100,000 tonnes
Total	1,000,000 tonnes

Each regional hub could include:

1. ISO-tank unloading facilities
2. Cryogenic LNG storage
3. Regasification equipment
4. Gas metering and Gas compression
5. Short pipeline connections to nearby customers
6. LNG truck-loading facilities

This modular system could be expanded gradually as demand increases.

9. Natural Gas Equivalent

Approximately 1 MTPA of LNG is equivalent to about 130–135 MMscfd of natural gas.

LNG	Approx. natural-gas equivalent
0.25 MTPA	33 MMscfd
0.50 MTPA	67 MMscfd
1.00 MTPA	134 MMscfd
2.00 MTPA	268 MMscfd
5.00 MTPA	670 MMscfd

Possible transportation:

Payra → River Barge/Rail → Barishal and surrounding areas

Hub 5 — Northern Bangladesh: 100,000 tonnes/year

Possible route: Chattogram → Rail → Dhaka → Bogura/Rajshahi/Rangpur.

This could provide LNG to regions where extending the high-pressure gas is difficult.



7. A Bangladesh-Specific 1 MTPA System

A practical starting point would be a 1.0 MTPA ISO-LNG system, with the possibility of expanding it to 2 MTPA

The proposed flow would be: Malaysia/ other LNG supplier → 40-ft LNG ISO tanks → Container vessel → Chattogram /Matarbari → LNG container depot → Rail/Barge/Truck → Regional LNG hubs → regasification → Customers

In short, it would function like a gas pipeline without requiring a continuous physical pipeline.

8. How Many ISO Tanks Would Be Required?

For planning purposes, the document assumes approximately 20 tonnes of LNG per 40-foot ISO tank. Therefore: 1,000,000 tonnes/year ÷ 20 tonnes/tank = 50,000 loaded tanks/year

This means approximately: 50,000 tanks per year- 4,170 tanks per month- 137 tanks per day

This is a substantial logistics operation, but it is not technically impossible. The actual number should be refined after selecting the specific ISO tank design, loading capacity, safety requirements, and operating procedures.

The proposal therefore suggests initially using ISO LNG for approximately 100–300 MMscfd of strategically distributed demand, rather than replacing the country's entire FSRU capacity.

10. Proposed Five Regional LNG Hubs

Hub 1 — Chattogram/Matarbari: 400,000 tonnes/year

Potential customers:

- Chattogram /Mirsarai industrial areas
- Fertilizer and Steel plants
- Ceramic industries
- Textile factories
- Power plants

Hub 2 — Dhaka/Narayanganj: 250,000 tonnes/year

Possible transportation: Chattogram → Rail/River Barge → Narayanganj

This could provide gas for industries without new pipelines for every industrial cluster.

Hub 3 — Khulna/Mongla: 150,000 tonnes/year

Possible transportation: Chattogram/Mongla → River Barge → Khulna

Hub 4 — Barishal/Payra: 100,000 tonnes/year

11. Transportation Strategy

Bangladesh should avoid relying entirely on trucks. A possible initial transportation mix:

Transport mode	Share	LNG/year
Rail	40%	400,000 tonnes
River barge	35%	350,000 tonnes
Truck	25%	250,000 tonnes
Total	100%	1,000,000 tonnes

This approach would reduce dependence on highways and make greater use of Bangladesh's rail and inland-waterway infrastructure. The exact percentages by a detailed feasibility study.

12. Container Vessel Requirement

For conceptual planning, assume that one container vessel can carry approximately 1,000 LNG ISO tanks, with each tank containing approximately 20 tonnes of LNG. Therefore: 1,000 tanks × 20 tonnes = 20,000 tonnes per vessel For 1 MTPA: 1,000,000 ÷ 20,000 = 50 vessel loads per year

This means approximately 4–5 vessel loads per month.

If larger vessels capable of carrying 1,500–2,000 ISO tanks are available and suitable for the selected port, the number of voyages could be reduced.

13. Indicative Capital Cost

The preliminary capital requirement for a 1 MTPA system could be approximately:

Component	Indicative CAPEX
LNG ISO tanks	\$250–400 million
Main receiving/depot infrastructure	\$10–20 million
Four to five regional hubs	\$25–30 million
Regasification equipment	\$100–180 million
Truck/rail/barge facilities	\$50–100 million
Safety and control systems	\$10–20 million
Total	\$445 million–\$750 million

These figures are conceptual estimates only and should not be treated as EPC quotations. The ISO-tank fleet is a major investment, but the tanks can be reused for many years and could potentially be leased rather than purchased.

- Offshore mooring systems
- Subsea unloading pipelines
- Large LNG storage tanks
- Large regasification terminals
- Extensive transmission pipelines

One published analysis cited in the source material estimated landed ISO-LNG costs of approximately \$7–9/MMBtu in a particular market. Bangladesh's actual cost could be very different because it would depend on the LNG purchase price, shipping distance, port charges, container utilization, transportation costs, and regasification costs. Therefore, ISO LNG should not necessarily be judged only by its \$/MMBtu cost.

Its other advantages are:

- Lower initial infrastructure requirement
- Faster implementation
- Greater flexibility
- Ability to serve geographically separated customers
- Reduced dependence on large pipelines
- Better emergency and backup capability
- Greater supply resilience

15. Why This Could Be Valuable for Bangladesh

The main attraction of the virtual LNG pipeline is flexibility. A conventional gas pipeline requires a large investment

- pipelines
- Experiencing gas shortages
- Growing faster than pipeline infrastructure

16. Recommended Strategy for Bangladesh

Bangladesh should not view ISO-tank LNG as a replacement for FSRUs. Instead, the country should develop a complementary three-part LNG system:

1. Bulk LNG

FSRU and land-based LNG terminals for: National gas grid, Major power plants, Major fertilizer plants, and Large industrial consumers

2. Small-Scale LNG

ISO tanks + conventional container vessels for:

- Industrial clusters
- Fertilizer plants and Captive power
- Textile, ceramic and glass industries
- Gas-short areas and Emergency supply

3. Virtual Gas Pipeline

ISO tanks + river barges + rail + trucks + regional regasification hubs for: Khulna, Barishal, Northern Bangladesh, Rajshahi and Remote industrial zones

This approach allows its LNG supply system to be built in stages instead of depending



14. Economics: The Key Question

The most important question is the delivered cost of LNG. ISO-tank LNG will normally have higher transportation and handling costs than bulk LNG delivered through an FSRU.

The ISO-tank system can reduce the need for major infrastructure:

- FSRU facilities

before gas can reach the area. ISO LNG can be delivered wherever there is a suitable road, rail, or waterway connection and an appropriate regasification facility.

This could be particularly useful for industrial areas that are:

- Outside the existing gas network
- Too far from major transmission

entirely on a few large facilities. The source document likewise recommends treating the ISO-tank network as a complementary system to FSRUs and land-based LNG infrastructure. 

Zainul Abedin, P.Eng. (Alberta), Oil & Gas Engineering Consultant (Retired), SNC-Lavalin (Canada), Aramco (KSA), KOC (Kuwait), SCOP (Iraq)



Engineer A R Mohammad Parvez Mazumder

Battery-Operated Three-Wheelers of Bangladesh: Environmental and Grid Strains Perspective

Battery-operated three-wheelers, commonly known as auto-rickshaws and easy bikes, have become a widespread mode of public transport across Bangladesh. These provide an affordable commuting option for millions of citizens, while serving as a vital source of livelihood for drivers and garage operators. However, their rapid expansion without structured regulatory oversight has introduced severe strain on the country's electrical grid and public infrastructure, including the environment. An estimated 5-8 million such vehicles currently operating nationwide consume roughly 5% or more of Bangladesh's total daily electricity generation.

The three-wheelers mostly use deep-cycle lead-acid batteries. Most of these vehicles use valve-regulated lead-acid (VRLA) types, while very few newer models and upgrades use lithium-ion alternatives.

The vast majority of the estimated 4-6 million three-wheelers run on lead-acid battery packs, which are typically 48-volt or 60-volt systems. Emerging options and modern upgrades utilize lithium-ion packs offering a longer lifespan and faster charging times. However, lithium-ion options



represent a smaller market share due to high prices. Lead-acid batteries generally last 12-24 months, whereas lithium-ion alternatives can last 3-5 years with proper maintenance. Drivers frequently purchase trusted domestic and foreign brands like Hamko, Eastern, Rimso, Rahimafrooz, and Kijo.

In Bangladesh, the three-wheelers do not use a single large 48-volt or 60-volt battery unit. Instead, these run on a series connection of standard 12-volt lead-acid batteries. A typical deep-cycle tubular or VRLA battery (also known as a sealed lead-acid (SLA) battery) used in these three-wheelers (at 100-130 ampere-hour capacity) weighs approximately 30-38 kg per 12-volt unit. In standard lead-acid batteries, pure metallic lead and lead compounds account for about 60-65% of the total battery weight (with the rest being electrolyte liquid and plastic casings).

Battery	Number of 12-volt Units	Weight	Lead Content (Lead and Lead Compounds)	Lead-acid Electrolyte Solution
48-volt	04 Batteries	120-150 kg	70-95 kg	35-45 kg
60-volt	05 Batteries	150-190 kg	90-120 kg	45-60 kg

Used lead-acid batteries in Bangladesh rarely go to formal landfills because lead holds high commercial value. Instead, informal scrap dealers buy these old batteries, smash the plastic casings, open and dump the toxic sulfuric acid directly onto surrounding soil and into local water bodies. They then melt the lead plates over open-fire pits without any safety equipment or pollution filters. According to reports by the Daily Star, Bangladesh generates nearly 4,80,000 tons of lead-acid battery waste every year, with these three-wheelers accounting for over 60% of this local battery



demand. The Daily Star further notes that around 80% of used lead-acid batteries in the country are processed through over 1,100 informal recycling sites, discharging millions of liters of untreated acid solution into rivers, canals and farmland. As documented in studies by Pure Earth and UNICEF, this uncontrolled recycling network releases vast amounts of lead into the environment, leaving approximately 36 million children in Bangladesh (about 60% of children) with elevated blood lead levels and causing severe environmental and long-term public health damage.

A full battery recharge takes approximately 6-8 hours using standard chargers. Millions of these vehicles rely heavily on informal or illegal grid connections for overnight charging. This practice draws thousands of megawatts of electricity and places significant stress on the national power grid.

To understand the energy scale required, each individual battery-operated three-wheeler consumes approximately 5-8 kilowatt-hours (kWh) of electricity per daily charging cycle- depending on battery age, depth of discharge, and vehicle capacity. Consequently, a baseline fleet of 5 million three-wheelers requires between 25,000-40,000 megawatt-

hours of electricity every single day. Thousands of these vehicles undergo charging simultaneously during overnight hours, creating a sharp demand spike that heavily burdens local transformers and distribution lines. Ultimately, this practice leads to frequent voltage fluctuations and localized power outages.

The root of this grid instability lies in the vast gap between formal infrastructure and actual demand. Bangladesh currently has only about 3,300 legally registered charging points. In contrast, Dhaka alone hosts over 48,000 informal and unauthorized charging hubs operating out of residential garages and makeshift workshops. These uncontrolled networks rely heavily on illegal direct line connections, causing significant energy theft that deprives the Government of nearly Tk 4,000 crore in annual revenue. Furthermore, the majority of auto-rickshaws use low-grade lead-acid batteries and inefficient charging equipment that dissipate significant amounts of electricity as waste heat, worsening the strain on the national power supply.

Beyond energy consumption, the informal nature of this sector poses environmental, public health, traffic, and urban management challenges. Unregulated battery disposal and

improper lead recycling contaminate local soil and water, exposing workers and communities to toxic heavy metals. At the same time, smart traffic cameras cannot track or enforce traffic laws due to a lack of official registration and standard license plates.

Addressing the impact of battery-operated three-wheelers requires a balanced strategy that preserves social benefits while protecting both the power sector and the environment. Establishing a formal policy framework to register every vehicle with traceable identification, alongside replacing illegal power hookups with designated solar-assisted or off-peak commercial charging stations, would substantially shield the grid. Transitioning the fleet from lead-acid batteries to energy-efficient lithium-ion technology would further optimize power use and eliminate illegal lead smelting and acid dumping while protecting soil, water, and public health. Through coordinated regulation, modernized charging networks, and technological upgrades, Bangladesh can convert these essential utility vehicles into a sustainable component of its national transport ecosystem without compromising energy security and the environment. ■■

Colonel (retd) Engineer A R Mohammad Parvez Mazumder, afwc, psc



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This achievement reflects NBBL's strong safety culture, robust Health, Safety and Environment (HSE) management systems, proactive risk management practices, and continuous pursuit of operational excellence.



Climate Crisis Now An Economic Security Emergency for Europe: UN Climate Chief

EP DESK

The climate crisis has become a continent-wide economic and security emergency for Europe, UN Climate Change Executive Secretary Simon Stiell told the European Parliament.

Stiell said extreme heat, floods and droughts were already causing deaths, damaging infrastructure and businesses, disrupting trade and energy supplies, and pushing up food and insurance costs. He cited an estimate that this summer's climate extremes could cost Europe around €180 billion through lost productivity and disruptions to food, energy and transport.

He warned that Europe's dependence on volatile fossil-fuel imports was worsening inflation, raising energy costs and undermining economic and energy security. Accelerating the transition to clean energy, he said, offers Europe a safer and more affordable path while creating jobs and investment opportunities.

Stiell noted that renewables now provide around half of Europe's power and that solar energy alone saved more than €30 billion in avoided gas imports during the first six months of the Middle East conflict. Globally, clean-energy investment exceeded \$2 trillion last year, about twice the level of fossil-fuel investment.

He urged the European Union to maintain its climate leadership and support vulnerable countries, while calling for stronger international cooperation ahead of COP31 in Türkiye. Current policies put the world on track for around 2.6°C of warming, he said, well above the 1.5°C goal, but concerted action could still bring temperatures back down toward that limit. [EP](#)

COP31 Presidency Sets Action Priorities Ahead of Antalya Summit

The presidency of the 31st UN Climate Change Conference (COP31) has outlined its priority themes and key milestones ahead of the conference in Antalya, Türkiye, emphasizing implementation, international cooperation, climate finance and practical solutions.

In a letter dated August 24, COP31 President-designate Murat Kurum said the COP31 Action Agenda would serve as a practical platform to strengthen partnerships, scale up solutions, mobilize finance and investment, and deliver tangible benefits for people, economies and ecosystems. The agenda builds on the five-year vision for the Global Climate Action Agenda launched at COP30 in Belém, Brazil.

The presidency has identified 10 priority areas: clean energy transition and electrification; zero waste and methane reduction; climate-resilient cities; green industrialization; youth and education; food security; oceans and seas; climate-resilient health systems; stronger coordination on climate, biodiversity and land issues; and a Climate Implementation Bridge to help countries turn climate and

development priorities into finance-ready projects.

Finance, technology and capacity building will serve as cross-cutting enablers across all 10 areas. The COP31 Action Agenda also includes thematic days covering food and agriculture, energy and transport, zero waste, resilient cities, finance and trade, youth and education, science and technology, human and social development, and implementation.

Several major events will help build momentum toward Antalya, including the Istanbul Climate Finance Summit, Ocean and Seas Summit, UNFCCC Climate Week 4, Climate Week NYC and the Pre-COP meeting in Fiji.

The Leaders' Summit, scheduled for November 11-12 during COP31, is expected to provide a platform for aligning national priorities, building partnerships and strengthening confidence in multilateral climate action. The presidency has also urged countries to submit their Biennial Transparency Reports under the Paris Agreement and their post-2030 nationally determined contributions. [EP](#)

COP30 Peer Learning Helps Countries Turn Climate Pledges into Action

Countries are increasingly learning from each other on how to translate their national climate commitments into practical action under a mandate adopted at COP30, according to UN Climate Change.

The Global Mutirão Decision adopted at COP30 called on the UNFCCC secretariat to organize peer exchanges on developing and implementing Nationally Determined Contributions (NDCs). So far, at least 22 such events have been held across the six regions covered by the UNFCCC secretariat and its Regional Collaboration Centers (RCCs).

The exchanges are taking place across Latin America and the Caribbean, the Middle East and North Africa, Asia and the Pacific, and Africa, with additional events planned in the coming months. The focus varies by region, ranging from climate finance and rural electrification to institutional coordination and carbon-market development.

In the Pacific, countries are discussing how small island administrations can coordinate limited resources and improve access to international climate finance. In East and Southern Africa, Seychelles has shared its experience establishing a dedicated climate finance unit, while Senegal has shared lessons



from its solar rural electrification program with Togo, Burkina Faso and Cameroon.

The Caribbean is linking peer learning directly with access to finance, bringing countries together with institutions including the Green Climate Fund and regional development banks. In Latin America, countries including Brazil, Colombia, Chile, Uruguay and Costa Rica have highlighted the need to involve finance, planning and sectoral

ministries in NDC implementation rather than leaving it solely to environment ministries.

The UN Climate Change secretariat said the exchanges demonstrate that countries do not have to navigate NDC implementation alone. By sharing both successful approaches and lessons from setbacks, the peer-learning process is helping countries develop more practical and financeable climate action plans ahead of COP31 in Türkiye. 

Wildfires Put Pressure on Türkiye to Lead Fossil Fuel Phaseout at COP31

Wildfires in Türkiye's Antalya province, which will host COP31, have intensified calls for the country to demonstrate stronger climate leadership and put a fossil fuel phase out at the center of the November summit.

Climate campaign group 350.org said hundreds of people have been evacuated and thousands left without power as fires spread across Antalya and other southern provinces. It

warned that rising temperatures and increasingly dry conditions are making wildfires more frequent and destructive.

The group urged Türkiye, as COP31 host and co-chair, to announce a national roadmap to reduce dependence on coal, oil and gas and accelerate a just transition to renewable energy.

"COP31 is an opportunity for Türkiye to demonstrate true leadership" by

advancing the transition away from fossil fuels, said Efe Baysal, 350.org Türkiye Manager. He also called for a clear timeline to phase out coal and stronger action to address the causes of the climate crisis.

350.org Türkiye is campaigning for a coal exit strategy, an end to fossil fuel subsidies and greater support for community-led renewable energy, arguing that climate action must address both the impacts and underlying causes of the crisis. 

PM Unveils Five-Point Plan to Tackle Energy Crisis

Prime Minister Tarique Rahman has unveiled a five-point strategy to address Bangladesh's energy crisis by boosting domestic gas production, intensifying exploration, strengthening BAPEX, expanding LNG infrastructure and reducing dependence on imported gas.

Replying to a question in Parliament recently, the Prime Minister said the government had adopted an integrated plan to build a more self-reliant and sustainable energy system.

Under a program to drill and rework 150 wells, 30 have already been completed, adding around 140 MMCFD of gas to the national grid. Seven more wells are under



drilling and are expected to add another 85 MMCFD. The government also plans 4,500 line-km of 2D and 4,200 sq km of 3D seismic surveys to identify new gas reserves.

Tarique said BAPEX would be strengthened through measures including the procurement of two new drilling rigs. The Offshore Model PSC 2026 has been approved and bidding invited, while the Onshore Model PSC is awaiting approval.

Govt Releases Tk6,000cr to Boost Oil-Fired Power Generation

The government has released Tk6,000 crore to boost electricity generation from oil-fired power plants and clear outstanding dues to private power

producers, State Minister for Power, Energy and Mineral Resources Anindya Islam Amit said.

The funds will be released in two instalments and mainly used to settle payments to private power producers, enabling them to purchase fuel and operate their plants more efficiently.

The government plans to increase oil-fired power generation by at least 5,000MW to reduce load-



shedding and ease pressure on gas-fired plants. Officials estimate that returning oil-fired plants to full operation could add around 2,500MW to the national grid.

The initiative is also aimed at freeing up gas for industrial consumers by shifting more power generation to fuel oil. Oil-fired generation currently costs around Tk120 crore a day, and fuel oil purchases will be increased to support higher output.

QatarEnergy Extends LNG Force Majeure for Bangladesh

QatarEnergy has extended its force majeure on liquefied natural gas (LNG) deliveries to Bangladesh, Pakistan and Italy amid continued disruptions to shipping through the Strait of Hormuz.



The reported extension means LNG supplies to Bangladesh will remain suspended beyond September, while cargo cancellations for Pakistani buyers will continue into October.

However, Petrobangla Director Md Shoyeb said the state-owned company had not received any notification from QatarEnergy regarding an extension.

QatarEnergy first declared force majeure in March

following disruptions to shipping through the Strait of Hormuz after the outbreak of the US-Iran war. Missile attacks on Qatar's Ras Laffan facilities also disrupted LNG production and exports.

QatarEnergy is Bangladesh's largest supplier of imported LNG under a 15-year long-term contract. The reported extension comes as Bangladesh continues to face a gas shortage affecting power generation and industrial production.

PM Says Phulbari Coal Extraction could be Considered to Ease Energy Crisis

Prime Minister Tarique Rahman has said the government may consider extracting high-quality coal from Phulbari in Dinajpur to help meet the country's energy needs

and save foreign currency, but any decision would priorities the resettlement and livelihoods of affected communities.

Responding to a supplementary question from lawmaker Sabikun Nahar in Parliament recently, the prime minister said Phulbari coal is among the best-quality coal in the world and could benefit the country if it helps address the energy crisis.

He acknowledged that



open-pit mining could affect agricultural land and settlements and said the government would first assess how affected people could be properly resettled without disrupting their livelihoods. Local communities should also benefit if the project is eventually implemented, he added.

Tarique Rahman said environmental concerns would receive due importance before any decision is taken.

Govt Steps Up Gas Exploration, Moves to Cut System Losses

The government has intensified efforts to boost domestic gas production through drilling and workover of 150 wells, seismic surveys



and strengthening of the Bangladesh Petroleum Exploration and Production Company (BAPEX), Power, Energy and Mineral Resources Minister Iqbal Hassan Mahmood told Parliament recently.

The minister said drilling of 30 wells has already been completed, adding around 100 million cubic feet per day (MMCFD) of gas to the national grid. Another 85 MMCFD is expected from seven wells currently under drilling.

The government plans to conduct 4,500 line kilometers of 2D and 4,200 square kilometers of 3D seismic surveys, while two new drilling rigs are being procured to strengthen BAPEX. Proposals to reopen closed gas wells are also being examined, he said.

On LNG, the government has approved a proposal by China's National Energy Engineering & Construction Co Ltd (CNEE) to install an FSRU at Kutubjom in Maheshkhali.

Bangladesh's Fossil Fuel Bill May Rise to \$2.8b in 2026: ZCA

Bangladesh's fossil fuel import bill could rise by up to \$2.8 billion in 2026, or around 30% from 2025, if oil, gas and coal prices remain at their January-August averages, according to an analysis by Zero Carbon Analytics (ZCA).



The additional cost could put further pressure on the taka, inflation and borrowing costs, while reducing the country's import cover from 5.7 months to 5.2 months.

The increase is equivalent to around 10% of Bangladesh's trade deficit, the analysis said.

Despite the higher bill, Bangladesh's LNG imports fell nearly 13% during January-August compared

with the same period in 2025.

Imports plunged about 83% between July and August, from 0.63 million tonnes to 0.11 million tonnes, amid disruptions through the Strait of Hormuz.

Around 64% of Bangladesh's electricity generation depends on gas, leaving the power system highly vulnerable to LNG supply disruptions.

PM Apologizes for Energy Crisis, Vows Long-Term Solution

Prime Minister Tarique Rahman has apologized to people and industries suffering from the country's ongoing electricity and fuel shortages, acknowledging the energy crisis as the government's biggest immediate challenge.



"We apologies on behalf of the party to all those, including ordinary people and factory owners, who are suffering from electricity and fuel shortages," he said recently, while addressing a discussion marking the 48th founding anniversary of the Bangladesh Nationalist Party (BNP) in Dhaka.

Tarique said his government had inherited a fragile economy and weaknesses in several sectors, including

energy. He acknowledged that many people were facing difficulties but said the government was not using the inherited problems merely as an excuse.

He said the government had already adopted an action plan to address the energy crisis, although its implementation would take time. The plan is also being designed to protect Bangladesh from similar energy disruptions arising from future global crises.

Bangladeshi Death Toll Rises to Four in Russia Gas Complex Fire

The number of Bangladeshi nationals killed in a fire at Russia's Amur Gas Chemical Complex (AGCC) has risen to four, following the death of Mahin Uddin of Narsingdi at a Moscow hospital recently.



Mahin died while undergoing treatment for injuries sustained in the August 25 fire at the complex near Svobodny in Russia's Far Eastern Amur Oblast, according to Mizanur Rahman, first secretary (labour) at the Bangladesh Embassy in Moscow.

The other Bangladeshi victims were Zakir Hossain of Kishoreganj, Md Alal Hossain Raju of Meherpur

and Abdul Quddus of Rajbari. The embassy said 36 Bangladeshis were injured in the incident, with one still receiving treatment in serious condition.

The AGCC initially reported seven deaths following the blaze but later said 14 foreign nationals had died. The fire reportedly started in a support section of the complex's pyrolysis unit, while the main equipment was not damaged.

Valve Problem Delays Rooppur Power Generation Target

A technical problem with a valve has delayed the target to supply around 300MW of electricity from the Rooppur Nuclear Power Plant to Bangladesh's national grid, Science and Technology Minister Faqir Mahub Anam said.



critical stage.

The minister said Russian and Bangladeshi scientists are working to resolve the problem. Removing, repairing, reinstalling and testing the valve could take one to one and a half months, he said.

Fuel loading at the plant began on April 28, with the government initially expecting power generation within four to six months.

However, one of the plant's valves has failed to open at the required pressure, preventing the project from advancing to the next

He added that Rosatom has assured Bangladesh it will send additional teams of specialists to identify and resolve the problem.

Bangladesh Ranks 17th Among US LNG Buyers as Imports Surge 61%



Bangladesh became the 17th-largest importer of US liquefied natural gas (LNG) in the first half of 2026, with purchases rising 61% year-on-year amid disruptions to traditional supplies from the Middle East.

According to the US Energy Information Administration (EIA), Bangladesh imported 50.23 billion cubic feet (bcf) of US LNG during January-June, compared with 31.27 bcf

in the same period of 2025. India ranked 10th among the top 20 buyers, while Pakistan was not on the list.

US LNG exports averaged 17.4 billion cubic feet per day during the first half of 2026, up 23% from a year earlier.

The EIA expects exports to average 17.3 bcf per day in the second half of 2026 and rise to 18.7 bcf per day in the first half of 2027.

Floods Halt Nepal's Power Exports to Bangladesh



Severe flooding in Nepal's Bhotekoshi river system has effectively halted electricity exports to Bangladesh, with Nepal's overall power exports falling sharply after several hydropower plants were damaged.

Nepal normally exports around 1,000MW during the wet season, but exports have dropped to about 650MW following the August 26 floods. The 22.1MW

Chilime and 24MW Trishuli hydropower projects, which supply electricity to Bangladesh through India, have been damaged and remain offline.

The Nepal Electricity Authority said it has asked India to allow electricity from alternative projects to be supplied to Bangladesh. It is also working to restore damaged generation and transmission infrastructure.

Govt Moves to Subsidize LPG for Rural Poor

The government has moved to introduce subsidized LPG cylinders for low-income rural households amid an ongoing shortage of cooking fuel, with the Ministry of Commerce seeking an urgent action plan from relevant authorities.



The program, approved by Prime Minister Tarique Rahman, is expected to be implemented through the Trading Corporation of Bangladesh (TCB)'s dealer network.

The government aims to expand access to cleaner cooking fuel among rural households that still rely

heavily on firewood, straw and kerosene.

Officials, however, have raised concerns over identifying eligible households, the ability of TCB dealers to safely handle LPG cylinders and the absence of a specific implementation deadline.

Energy experts also warned that subsidies alone cannot resolve the country's wider LPG supply shortage.

Novatek Proposes \$950m Offshore LNG Terminal for Bangladesh

Novatek Middle East has proposed a \$950 million gravity-based structure (GBS) LNG terminal in the Bay of Bengal as an alternative to Bangladesh's planned land-based facility at Matarbari.



The company presented the preliminary concept to Petrobangla, proposing a fixed offshore terminal with 7.5 million tonnes per annum (MTPA) of regasification capacity.

Novatek estimates the facility would cost about 21% less than a conventional 7.5-MTPA land-based terminal, estimated at \$1.2 billion. The figures, however, have not been independently verified.

The proposed GBS could be built in 30-36 months and have a design life of 60-80 years. Possible sites include deep-sea areas near Maheshkhali and Matarbari.

The facility would send regasified LNG to the national grid through a subsea pipeline.

The proposal is still at an early stage, and Novatek has not submitted a formal proposal.

US Firms Keen to Build More FSRUs in Bangladesh: Envoy

US companies are highly interested in building and operating additional floating storage and regasification units (FSRUs) in Bangladesh, US Ambassador Brent T. Christensen said during a meeting with Commerce Minister Khandakar Abdul Muktadir in Dhaka on September 7.



Christensen stressed the need for a transparent and competitive process for major infrastructure projects, saying it would boost foreign investors' confidence and encourage greater US participation in Bangladesh's energy sector.

Muktadir welcomed US investment, saying American companies would receive the highest priority if they

could demonstrate the capacity to deliver an FSRU within the shortest possible timeframe. The two sides also discussed expanding bilateral trade, improving the business environment and strengthening energy cooperation.

Meanwhile, Summit LNG Terminal II has asked Petrobangla to reconsider the cancellation of its FSRU project, claiming that retaining its BOOT-based project could save Bangladesh around \$1.1 billion.

Gas Crisis Drives Surge in Electric Cooker Sales

A prolonged shortage of piped gas in parts of Dhaka has triggered a sharp rise in demand for electric cooking appliances as households seek alternatives to unreliable gas supplies.



The crisis began on July 22 after disruptions involving floating storage and regasification units (FSRUs) cut liquefied natural gas supplies to the national grid by around 450 million cubic feet per day (MMCFD), or nearly 17 percent.

Although supplies have improved in some areas, daytime gas pressure remains inadequate in many households.

The disruption has boosted sales of infrared and rice cookers in particular. Industry players estimate Bangladesh's annual electric cooker market at less than Tk200 crore.

RFL Chief Marketing Officer Murshid Muneem said demand for infrared cookers had more than doubled year-on-year, while rice cooker sales had increased by around 200-300 percent.

Govt to Monitor Global Energy Prices Before Revising Domestic Fuel Rates

The government will monitor global energy prices for three months before deciding on any revision of domestic fuel prices, as rising international costs put growing pressure on energy subsidies.



The Finance Ministry has instructed the Energy and Mineral Resources Division to prepare a price adjustment proposal after the observation period.

A six-member committee, headed by Additional Secretary Md Hasanul Matin, has been formed to assess global price trends,

subsidy requirements and outstanding payments to independent power producers (IPPs).

The move comes amid a sharp increase in subsidy requirements, particularly for LNG. Against an initial Tk6,000 crore allocation for LNG subsidies in the current fiscal year, the government has already provided around Tk7,000 crore, including outstanding payments.



Greenpage

Govt to Replace Diesel Irrigation Pumps with Solar within 5 Years: PM

The government plans to gradually replace diesel-powered irrigation pumps with solar-powered systems across Bangladesh within the next five years, Prime Minister Tarique Rahman told Parliament recently.



Replying to a supplementary question, the Prime Minister said all diesel-operated irrigation pumps would be brought under the solar program in phases as part of efforts to expand renewable energy and reduce dependence on imported fuel.

Bangladesh aims to meet at least 20% of its electricity demand from renewable sources by 2030 and 30% by 2040. The government has set targets of 5,500MW from rooftop solar,

4,500MW from ground-mounted solar and 450–550MW from other renewable sources by 2030.

Tarique also said the government was encouraging lithium battery-based energy storage and would support industries producing such batteries. Lithium batteries could eventually be made mandatory for rooftop solar systems, he added.

Germany Provides €12m Grant for Coastal Protection, Energy Efficiency in Bangladesh

Germany has committed €12 million in grants to support two projects in Bangladesh focusing on coastal ecosystem protection and energy efficiency.

Two memoranda of understanding were signed at the Economic Relations Division (ERD) in Dhaka.

The €5.0 million coastal project will be jointly implemented by the Department of Fisheries and the Forest Department to strengthen the protection, restoration and sustainable use of coastal and marine resources with community participation.

A separate €7 million grant will support the “Energy Efficiency for



Sustainable Development” project, jointly implemented by the Sustainable and Renewable Energy Development Authority (SREDA) and Bangladesh Standards and Testing Institution (BSTI).

The project aims to improve energy efficiency in industries and residential buildings, reduce electricity consumption from the national grid and promote energy-efficient technologies and standards.

Bangladesh Targets 20% RE by 2030: Amit

Bangladesh aims to generate at least 20% of its electricity from renewable sources by 2030, State Minister for Power, Energy and Mineral Resources Anindya Islam Amit told Parliament recently.

He said rooftop solar is expected to contribute 5,500MW and ground-mounted solar 4,500MW, while wind, waste-



to-energy, hydropower, floating solar and agrivoltaic projects could add another 450–550MW. Electricity demand could reach 24,000–25,000MW by 2030 amid continued economic and industrial growth.

Under the National Renewable Energy Development Strategy 2026–2030, the government also targets 30% renewable electricity by 2040.

To encourage investment, import duties on solar panels, inverters, batteries and related equipment have been reduced to 1%, while surplus rooftop power can be sold to the grid at Tk10.50 per unit.

Clean Energy Vital for Bangladesh's Apparel Competitiveness: EU Envoy

Greater access to clean and affordable energy will be crucial for Bangladesh's garment industry to remain competitive as European markets and global supply chains shift towards a low-carbon economy, EU Ambassador and Head of Delegation Michael Miller said.



Speaking at a recent Dhaka roundtable on apparel decarbonization, Miller said Bangladesh could combine its manufacturing strength with cleaner production to strengthen its position as a sustainable sourcing destination.

The event was jointly organized by HSBC Bangladesh, Apparel Impact Institute, the Embassy of Sweden and the EU Delegation.

Research presented at the event showed that Bangladesh's apparel sector needs about \$6.6 billion

in investment to achieve 50% decarbonization by 2030.

Participants said reliable and competitively priced renewable energy could help manufacturers reduce emissions and energy costs while meeting the growing sustainability requirements of international brands. Greater access to clean energy could also help attract investment and strengthen Bangladesh's position in global apparel sourcing.

RE Key to RMG Sector's Future: Experts



Bangladesh's readymade garment (RMG) sector must make renewable energy and energy sovereignty central to its long-term industrial strategy as the ongoing energy crisis, rising fuel-import dependence and unreliable supplies threaten the sector's sustainability and competitiveness, experts said.

The call was made at the "Rapid Energy Transition Conference: Powering Security, Sustainability and Growth in Bangladesh RMG," organized by Ethical Trading Initiative (ETI) Bangladesh in Dhaka recently.

The event brought together 108

representatives from RMG factories, along with officials from BGMEA, BKMEA and BSREA, international brands, financial institutions and renewable-energy companies.

ETI Bangladesh Executive Director Abil Bin Amin called for a just and collaborative energy transition, saying factories and workers should not bear the cost of meeting climate targets alone.

BKMEA Director Engr Imran Kader Turjo said Bangladesh was already late in developing renewable-energy and related infrastructure and urged rapid implementation.



Govt Moves Tk10bn to Boost Rooftop Solar Amid Power Crisis



The government has asked the Finance Division to divert Tk10 billion from the development budget to accelerate rooftop solar installations as part of efforts to tackle the ongoing power crisis.

The proposed fund would be taken from a Tk20 billion allocation for state-run organizations involved in microcredit and poverty alleviation. The Finance Division is expected to finalize the fund's use for solar power generation at a meeting next week.

The move follows a Finance Division proposal outlining short-, medium- and long-term measures to address the energy crisis.

Officials believe stronger financial and policy support for public and private solar projects could significantly increase renewable generation before next summer and help reduce power shortages.

Rooftop Solar Could Cut Thailand's Rising LNG Import Costs: IEEFA

Thailand could significantly reduce its dependence on imported liquefied natural gas (LNG) by reforming policies that have slowed rooftop solar development, according to a report by the Institute for Energy Economics and Financial Analysis (IEEFA).



Declining domestic gas production has increased Thailand's reliance on imported LNG, exposing the economy to volatile global prices. The government now aims to generate 60% of electricity from clean energy by 2050, double its previous target.

Rooftop solar accounted for about 3.6 GW of Thailand's solar capacity in early 2026, but high installation costs, low electricity buyback rates, restrictive quotas and policy uncertainty have limited growth. Rooftop systems cost

around \$936 per kW, nearly 50% higher than in some regional markets.

IEEFA said the current buyback rate of THB 2.20 (\$0.07) per kWh is significantly below the average retail electricity tariff of about THB 3.88/kWh. The residential solar payback period is therefore around six to seven years.

The report recommends shifting from net billing to net metering, raising solar buyback rates, removing restrictive quotas, streamlining tax incentives and accelerating rooftop solar combined with battery storage.

FUSA Begins Phased Rollout of Solar Core Fusion Extraction Program

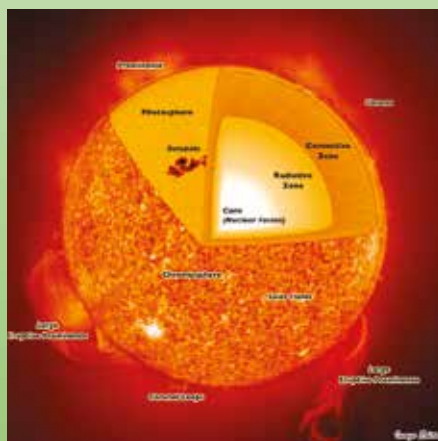
FUSA has begun the phased rollout of its Solar Core Fusion Extraction program, aiming to move from national participation to industrial access and eventually smaller commercial and domestic applications.

The company said the patent rights supporting the program have received an independent third-party valuation prepared under International Valuation Standards, with a published lower-end figure of US\$3.4 trillion.

According to FUSA, the program is based on its "Star Law", or Entanglement Relativity, and seeks to develop a method for directly accessing fusion energy from the Solar Core.

FUSA said its experimental program included four IBM Kingston-Marrakesh quantum-hardware campaigns, each involving 330,000 circuit executions.

The company reported positive "informationized energy transmission"



and successful work extraction across all tests, with the final campaign recording a transmitted value exceeding 5 TW.

The program uses a receiving terminal called the "Dave" transducer to perform conditional quantum work extraction. FUSA plans to begin deployment with governments and energy-intensive industries, subject to applicable legislation and electrical homologation.



Denmark's Energy Islands Set to Reshape Regional Power Markets



Denmark's planned energy islands could become regional hubs for offshore wind, cross-border electricity trade and green fuel production as the country accelerates its clean energy transition, according to GlobalData.

Denmark plans an artificial energy island in the North Sea with an initial capacity of 3 GW, alongside an energy hub at Bornholm in the Baltic Sea.

The facilities will collect power from offshore wind farms, transmit electricity to Denmark and neighboring countries, and potentially convert surplus power into green fuels through Power-to-X technologies.

GlobalData forecasts Denmark's electricity generation will rise from about 33.6 TWh in 2025 to 43.3 TWh by 2035, with renewables accounting for nearly 98% of generation.

More than 8.7 GW of offshore wind projects are currently in the permitting or announced stages, within a total pipeline exceeding 17.6 GW.

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PM Orders Tougher Action to Curb Polythene, Plastic Use

Prime Minister Tarique Rahman has ordered law enforcement agencies to take tougher action against excessive use of polythene and plastic to curb environmental pollution.



He also directed relevant ministries, divisions and agencies to properly implement their responsibilities while making ongoing pollution-control programmes more effective.

The directives came at a recent review meeting at the Secretariat on measures to control air, water, soil and noise pollution,

improve waste management and strengthen future environmental initiatives.

The meeting also emphasised expanding the use of environment-friendly block bricks as an alternative to conventional fired bricks.

UN Finalizes Declaration on Sea Level Rise

UN Member States have finalized negotiations on a concise, action-oriented declaration addressing the growing threat of sea level rise. The declaration is expected to be adopted by consensus at a UN General Assembly high-level plenary meeting on September 24, 2026.



challenges, culture and heritage; and the legal dimensions of sea level rise.

The declaration draws on scientific assessments by the IPCC and other international bodies and highlights the need for nature-based solutions and ecosystem-based approaches. It also notes the relevance of recent International Court of Justice and International Law Commission work on sea level rise and international law.

It identifies four key areas for action: knowledge, data and science; adaptation, finance and resilience; livelihoods, socioeconomic

The UN held its first high-level meeting on sea level rise in September 2024.

UNCCD COP17 Defers Key Issues, Including Synergies, to COP18

The 17th session of the UN Convention to Combat Desertification (UNCCD COP17) concluded in Ulaanbaatar, Mongolia, recently, with 34 decisions adopted, while several key issues were deferred to COP18, including gender, civil society participation and synergies with other multilateral environmental agreements.



Despite geopolitical tensions and disagreements, delegates reaffirmed the need for greater international cooperation. Ministerial dialogues during the second week highlighted calls to strengthen coordination among the three Rio Conventions on climate change, biodiversity and desertification.

Agreement was also reached on several substantive issues, including rangelands and pastoralists, a major priority of the Mongolian presidency.

The COP encouraged countries to develop policies for the sustainable management, conservation and restoration of rangelands, which cover about 54% of the world's land surface and support nearly 500 million pastoralists.

South Asia Needs Stronger Regional Cooperation to Combat Wildlife Crime: Minister

Bangladesh Environment, Forest and Climate Change Minister Abdul Awal Mintoo has called for stronger regional cooperation in South Asia to combat the growing threat of transnational and organised wildlife crime.



Speaking at the first General Assembly of the South Asia Wildlife Enforcement Network (SAWEN) in Kathmandu on September 10, the minister stressed the need to strengthen regional intelligence sharing, coordinated law enforcement and joint operations.

He said wildlife and ecosystems do not recognise political borders, while criminal networks are increasingly using borders,

transport routes, trade channels, online platforms and financial systems to conduct wildlife trafficking.

The minister called for law enforcement agencies to go beyond wildlife seizures and arrests and identify the organisers, financiers and wider criminal networks behind such crimes. He also urged authorities to use every seizure as an opportunity to gather intelligence on the source, routes, people involved, financing and intended destinations.

Bangladesh Urges Coordinated Action to Turn Tree Planting into Sustainable Social Movement

Environment, Forest and Climate Change State Minister Sheikh Faridul Islam has called for coordinated efforts to turn tree planting into a sustainable social movement.



He made the remarks while chairing the third meeting of the support taskforce of the National Tree Plantation Cell formed to implement the government's "250 million trees in five years" programme at the ministry's meeting room at the Bangladesh Secretariat on September 7.

The state minister said tree planting is crucial to tackling climate change, conserving biodiversity and maintaining ecological balance. He stressed that the focus should not only be on the

number of saplings planted but also on their protection, maintenance and survival.

The meeting was informed that 51.49 million saplings are planned to be planted and maintained in 2026, including around 38.2 million produced by the relevant agencies and 13.3 million procured using their own funds. NGOs have separately planted around 2.5 million saplings, according to the NGO Affairs Bureau.

PM Directs Coordinated Action for Pollution-Free Rivers

Prime Minister Tarique Rahman on September 6 directed all concerned to play their due roles in ensuring pollution-free rivers and a clean, liveable environment for future generations.



"Alongside ourselves, we must strive to leave pollution-free rivers and a liveable environment for the next generation. We cannot simply wait for government directives; we must also act out of our own sense of responsibility," he said.

The Prime Minister was speaking at a review meeting at Bangladesh Secretariat on pollution control, waste removal, conservation and management of rivers

around Dhaka, ensuring navigability and developing the circular waterways.

Prime Minister's Assistant Press Secretary Gazi Shahriar Pamir told reporters that the meeting reviewed measures to control pollution and remove waste from the Buriganga, Turag, Dhaleshwari, Balu and Shitalakkhya rivers and their adjoining canals and drains, ensure navigability and normal water flow, and improve the existing circular waterways around Dhaka.

Bangladesh, India Agree to Strengthen Joint Environmental and Wildlife Conservation Efforts

Environment, Forest and Climate Change Minister Abdul Awal Mintoo held a courtesy meeting with Indian High Commissioner to Bangladesh Dinesh Trivedi at the Bangladesh Secretariat on Sept 7.



State Minister for Environment, Forest and Climate Change Sheikh Faridul Islam was also present.

During the meeting, the two sides agreed to hold the next meeting of the Joint Working Group on biodiversity conservation in the Sundarbans in Bangladesh under the

existing memorandum of understanding between the two countries.

They also agreed to hold the next bilateral meeting in Bangladesh under the protocol signed for Royal Bengal Tiger conservation.

The two sides decided that the next meeting on transboundary conservation of the Asian elephant would be held in India.

Bangladesh, Nepal Discuss Stronger Cooperation on Climate and Environment

Environment, Forest and Climate Change Minister Abdul Awal Mintoo held a courtesy meeting with Nepalese Ambassador to Bangladesh Ghanshyam Bhandari on September 6 at the Bangladesh Secretariat.



During the meeting, the two sides discussed various aspects of the longstanding friendly relations between Bangladesh and Nepal, with particular emphasis on environmental protection, climate change, biodiversity conservation, sustainable management of forests and natural resources, and regional environmental cooperation.

Minister Mintoo expressed deep condolences over

the recent tragic accident in Nepal and conveyed sympathy to the families of those who lost their lives. He wished a speedy recovery for those injured and said Bangladesh stands beside the government and people of Nepal during this difficult time.

The minister said that although Bangladesh and Nepal face different climate-related risks, their ecosystems are closely interconnected.

EU Approves €2.0b Fund to Accelerate Decarbonization of Greek Islands



The European Commission and the European Investment Bank (EIB) have approved a €2.0 billion investment fund to support the decarbonization of Greece's islands through electricity interconnections, renewable energy, energy storage and electric mobility.

The Islands Decarbonization Fund, developed jointly by the Greek government, the European Commission

and the EIB, will finance projects aimed at reducing the islands' reliance on costly diesel-fired power generation while improving energy security and accelerating the country's green transition.

About €1.1 billion of the fund will be allocated to electricity interconnections and related infrastructure in the Dodecanese, Cyclades and northeastern Aegean islands.

UNCTAD Highlights Bangladesh's Investment Climate Reforms

Bangladesh's efforts to improve its investment climate have been recognized as a model of reform implementation at the 16th session of the Investment, Enterprise and Development Commission of the United Nations Conference on Trade and Development (UNCTAD) in Geneva on September 3.

Bangladesh and Tunisia were presented as examples of developing economies taking steps to improve investment conditions amid geopolitical tensions and changing global supply chains.

Representing Bangladesh, Invest Bangladesh Executive Member Nahian Rahman



Rochi said the country is focusing on removing practical barriers for investors, including delays in security clearances, foreign financing, capital repatriation, digital services and inter-agency coordination.

UNCTAD's review noted progress in Bangladesh in regulatory processes, institutional coordination, digital investor services and investment promotion capacity since its first Investment Policy Review in 2013.

Extensive Tree Plantation Vital for Environment, Biodiversity: State Minister

Extensive tree plantation is vital for protecting the environment and biodiversity, State Minister for Environment, Forest and Climate Change Sheikh Faridul Islam said on September 4.



He made the remarks while attending a tree plantation programme as the chief guest at Hasura Mouza in Niamatpur upazila of Naogaon district.

Under a large-scale afforestation programme, around 20,000 saplings of 15 species have been planted along a 20-kilometer strip plantation in the area. The

plantation has been carried out on both sides of canals stretching from Crossdam to land owned by Rajjak Chairman in Beltri Mouza and from land owned by Shiberswar to land owned by Palash through Hasura Mouza.

The state minister said planned afforestation should be expanded to increase the country's green cover and maintain environmental balance.

Bangladesh Forms High-Level Committee on Climate Finance and Carbon Trading

The Bangladesh government has formed a 25-member National Committee on Climate Finance (NCCF) to bring climate finance, carbon credits and carbon trading activities under a coordinated national framework.



Under a notification issued by the Ministry of Environment, Forest and Climate Change on September 1, Prime Minister Tarique Rahman will chair the committee, while Environment Minister Abdul Awal Mintoo will serve as vice-chair.

Prime Minister's Special Assistant for Environment, Forest and Climate Change Dr Md Saimum Parvez has been appointed coordinator, while

the ministry secretary will serve as member-secretary.

The committee includes State Minister for Environment, Forest and Climate Change Sheikh Faridul Islam, the Prime Minister's Special Assistant for Health Dr SM Ziauddin Haider, and Adviser Mahdi Amin, who oversees education, primary and mass education, expatriates' welfare and overseas employment, and labour and employment.

Environment Minister Calls for Immediate Action to Safeguard Bangladesh's Climate Future

Environment, Forest and Climate Change Minister Abdul Awal Mintoo has stressed that actions taken today to address the climate crisis will determine the safety and security of future generations.



He made the remarks on September 2 while addressing the closing and award-giving ceremony of World Environment Day and Environment Fair 2026 at the Department of Environment auditorium in Agargaon, Dhaka.

Mintoo said effective action must be taken immediately to address the growing risks posed by climate change. Sustainable development

can be achieved by building an environmentally friendly economy that balances environmental protection, social development and economic growth.

He said a green economy based on low-carbon emissions, efficient use of resources, cleaner production and green employment would play a vital role in meeting the challenges of sustainable development in the 21st century.

India Installs 6.6 GW of Rooftop Solar in First Half of 2026

India added 6.6 GW of rooftop solar capacity in the first half of calendar year 2026, up 136% from 2.8 GW during the same period in 2025, according to Mercom India's Q2 and H1 2026 India Rooftop Solar Market Report.



Installations reached 3.8 GW in the second quarter, rising 41% from 2.7 GW in Q1 and 136% year-on-year from 1.6 GW in Q2 2025. Rooftop solar accounted for 33% of India's total solar installations during the quarter.

Growth was largely driven by the government's Pradhan Mantri Surya Ghar Muft Bijli Yojana (PM Surya Ghar) program. By June 2026, rooftop solar systems had been installed in nearly

4.5 million households, reaching about 45% of the program's target of 10 million households.

Residential projects dominated Q2 installations, accounting for 84% of new capacity. Industrial projects contributed 10%, commercial installations 5% and government projects 1%. The capex model represented the majority of quarterly additions.

Friendship Founder Runa Khan Wins Ramon Magsaysay Award 2026

Runa Khan, founder and executive director of Bangladeshi social development organisation Friendship, has been named a recipient of the Ramon Magsaysay Award 2026 for her decades-long efforts to improve the lives of people living in remote, river-eroded and climate-vulnerable communities across Bangladesh.



The Ramon Magsaysay Award Foundation (RMAF) announced the 2026 recipients in Manila on August 31. Alongside Runa Khan, Singaporean diplomat and international law expert Tommy Koh and Myanmar activist Bo Kyi have been selected for this year's award.

The awards will be formally presented at the Metropolitan Theater in Manila on November 15.

According to the foundation, Runa Khan is being honoured for her deep empathy for some of Bangladesh's poorest communities and for her courage, vision and determination in establishing and leading Friendship.

Europe Reworks Offshore Wind Policies to Drive Next Phase of RE

Europe is entering a new phase of offshore wind development as governments move from ambitious targets toward project execution, according to GlobalData.



Redesigned auctions, stronger revenue stabilization mechanisms and faster permitting are helping countries build multi-gigawatt offshore wind pipelines.

GlobalData's latest report, Europe Renewable Energy Policy Handbook 2026, says offshore wind is increasingly being viewed as strategic infrastructure rather than simply another power generation technology.

The shift reflects the sector's potential to deliver

large-scale volumes of low-carbon electricity.

"A key differentiator is no longer simply who offers the lowest price, but who can deliver at scale under permitting limits, supply-chain constraints and increasingly complex grid integration," said Attaurrahman Ojindaram Saibasan, Power Analyst at GlobalData.

IDCOL Targets 4,800MW Solar Capacity By 2030

IDCOL will begin field-level activities this month under its Distributed Rooftop Solar (DRS) program, targeting at least 500MW of new capacity by next February. At the same time, the ongoing rooftop solar program is expected to add another 500MW of rooftop solar capacity in the industrial sector. Overall, IDCOL aims to facilitate the development of 4,800MW of solar capacity by 2030 through IPP, Merchant Power Plant (MPP) and rooftop solar projects.

Infrastructure Development Company Limited (IDCOL) Managing Director (Acting) S.M. Monirul Islam disclosed this in an interview with Energy & Power Editor Mollah Amzad Hossain.

The government has announced an incentive package to promote rooftop solar projects with battery storage, aiming to achieve significant progress within the next six months. How effective do you think the incentives will be in encouraging new projects? There are also questions about the decision to purchase surplus electricity at Tk 10.50 per unit for only three years. What is your view?

There is no doubt that this program's implementation period is short. However, the potential of the sector is enormous. So, although there are challenges, the target is achievable. Institutions like IDCOL have extensive experience in implementing residential off-grid solar programs in rural areas. Therefore, we believe the target can be achieved.

Regarding the price and purchase of surplus electricity, the government has already clarified the relevant issues. As part of the financial incentives, exemptions from duties and taxes have been provided for solar equipment.

Under the net-metering guidelines, consumers were initially allowed to install solar systems with capacity below their total demand and adjust the electricity exported to the grid against their electricity bills. The issue of surplus electricity has emerged as the scope of solar installation has expanded.

Initially, the net-metering ceiling allowed

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solar systems up to 70% of a consumer's sanctioned load. This was later increased to 100%. Under the current guidelines, systems of up to 80kW can be installed under the applicable arrangement.

For example, if your electricity demand is 500 units but your rooftop solar system can generate 1,000 units, you can generate the additional electricity and

sell the surplus to the government at Tk 10.50 per unit.

Does this create an opportunity for investment under an OPEX model? Residential consumers may not always have the capacity to invest themselves.

IDCOL is going to launch a Distributed Rooftop Solar (DRS) program for the residential sector. We previously implemented similar programs in the off-grid sector.

Under the new program, we have finalized Demand Aggregators (DAs). They will assess local demand and install rooftop solar systems with battery storage for consumers. They will also be able to obtain refinancing from IDCOL on favorable terms.

The financing model will require the customer to provide a 20% down payment, while the Demand Aggregator will contribute another 20%. IDCOL will provide the remaining 60% as a loan.

IDCOL's Solar Home System program is considered a successful initiative and is still being followed internationally. Drawing on that experience, you are now launching a domestic rooftop solar program. What is its objective? How much capacity do you expect to add by next February?

Let me first explain the system sizes. Considering differences in consumer demand, we have identified several rooftop solar packages with battery storage. Each package has been designed with battery storage equivalent to three hours of the consumer's full demand.

Through efficient use of electricity, the three-hour backup can potentially be extended to around five hours. We have



S.M. Monirul Islam

The issue of interest rate on financing projects has not yet been finalized. However, IDCOL will provide loans to Demand Aggregators (DAs) at an interest rate of 5% for seven years. The DAs will then provide loans to residential customers for five years, with the interest rate expected to be around 9-10%. The final lending rate will be determined once implementation of the program begins.

finalized different packages for systems ranging from 2kW to 80kW.

However, considering the availability of rooftop space in residential buildings, we expect 3-5kW systems to be the most popular packages.

How much investment would be required for a 3-5kW system with the planned battery storage?

A 3kW system with three hours of battery backup, a hybrid inverter, and an energy meter will cost slightly more than Tk 200,000.

We have also determined prices for other packages based on a review of market conditions. However, it is important to understand that these prices represent the maximum investment levels under our program. A Demand Aggregator or investor can offer the system at a price lower than the ceiling we have set.

I believe that as the market expands and competition increases, prices will gradually come down.

Will these Demand Aggregators (DAs) be IDCOL's partner organizations? How are they being selected, and how will they operate?

Essentially, the DAs will work as our partner organizations. As you know, the implementation period is very short. Therefore, we want to deploy organizations with the necessary experience as quickly as possible.

During the implementation of the off-grid Solar Home System program, we worked with a number of partner organizations that have extensive experience in this field. Among them, organizations with good records, including loan repayment performance, have been selected initially as DAs.

Alongside them, we will issue an Expression of Interest (Eoi) to enlist other organizations that have gained experience in solar installation. Interested organizations will be evaluated and enlisted as DAs as quickly as possible.

You mentioned at the beginning that IDCOL wants to achieve significant progress through the DRS program by February. What exactly is your target?

We want to add at least 1,000MW of rooftop solar capacity by next February. There are two components to this target. The first is rooftop solar in the industrial sector, where we have been working for several years. We plan to accelerate the ongoing program and add another 500MW of capacity during this period. At the same time, the new DRS program is expected to add at least another 500MW.

Thus, our immediate target is to add at least 1,000MW through these two programs by next February. In the longer term, IDCOL is working to facilitate the development of around 4,800MW of solar capacity by 2030 through different financing programs.

The government has finalized a development strategy to expand renewable energy capacity through 2030. Under the strategy, the target is to add 10,450MW of renewable energy capacity, including 5,500MW of rooftop solar. What programs does IDCOL have to help achieve this target?

Let me start with large-scale solar projects. IDCOL is working on financing IPP projects that are currently in the pipeline. We expect to bring around 1,000MW of projects in this segment under our financing program by 2030.

Work is also underway to finalize the wheeling charge policy under the Merchant Power Plant (MPP) Policy. Entrepreneurs have already approached us seeking investment support for around 1,000MW of solar power projects under

the MPP framework. IDCOL will work on these projects.

In the industrial sector, we are working to add 500MW of new rooftop solar capacity by February and 1,000MW by 2030. We also aim to add another 1,000MW through the Domestic Rooftop Solar (DRS) program, although the potential in this segment is much higher.

At the same time, IDCOL is working to mobilize financing. The government has already agreed to provide the funds required for such programs.

Considering the overall target, IDCOL is currently working to facilitate financing for around 4,800MW of solar capacity by 2030.

IDCOL has been leading the development of solar-powered irrigation systems. It has been suggested that a business model is needed to replace diesel-powered irrigation with solar irrigation. What are the obstacles to developing such a model?

We have been working on solar irrigation pumps for many years, and 1,523 projects have already been implemented. There is significant potential for success if diesel-powered pumps can be replaced with solar pumps.

The challenge is that water has to be supplied at a relatively lower cost than under diesel-powered irrigation. To achieve that, these projects currently require around a 50% subsidy. This raises questions about how long such subsidies can be provided and how long a subsidy-dependent business model can remain sustainable.

However, additional initiatives are needed to make solar irrigation more attractive. Solar capacity can be fully utilized for irrigation for around five months of the year. If the electricity generated by the system during the remaining period can be integrated into the grid and sold, it would improve the project's economics.

Therefore, just as preferential tariffs have been considered for rooftop solar, introducing a preferential tariff for solar irrigation could create new interest in replacing diesel-powered irrigation pumps with solar systems.

Agrivoltaic solar is now receiving growing attention globally. A project has already been connected to the grid with support from the German government and IDCOL. How much potential do you see in this sector?

A pilot agrivoltaic project has been implemented in Chuadanga under an initiative of Wave Foundation, with financing from IDCOL. GIZ is providing technical assistance through a foreign expert on the design and the types of crops that can be cultivated under the system. IDCOL has also received financial

support from KfW for the project.

However, the pilot project itself is not the main issue. The future expansion of agrivoltaics will depend largely on how agricultural practices and productivity evolve. Based on the experience and agricultural outcomes of the pilot, we will consider the scope for implementing similar projects on a larger scale.

Financing, particularly low-cost financing, is crucial for expanding renewable energy. But globally, sources of grants and low-cost development finance are shrinking. What challenges does Bangladesh face in financing renewable energy development, and what preparations does IDCOL have in this regard?

Low-cost development finance is continuously declining, while the terms and conditions imposed by IDCOL's financing partners have also become more stringent. For rooftop solar, IDCOL has mobilized financing from different sources and created a blended fund. We are using this fund to provide financing to the market at affordable interest rates.

What will be the interest rate on financing provided under the DRS program?

The matter has not yet been finalized. However, IDCOL will provide loans to Demand Aggregators (DAs) at an interest rate of 5% for seven years. The DAs will then provide loans to residential customers for five years, with the interest rate expected to be around 9–10%. The final lending rate will be determined once implementation of the program begins.

Although electric vehicles have yet to develop significantly in Bangladesh, a large amount of electricity is being consumed to charge battery-powered rickshaws. Is IDCOL considering developing solar-based charging systems?

We have some involvement in electric mobility. However, if IDCOL is to support any project or vehicle, it must have a legal basis. Battery-powered rickshaws are not yet fully covered by the legal framework.

A project to manufacture lithium batteries has already approached us for financing, and it is under consideration. We are also working on the development of solar charging stations and exploring how to establish a viable commercial model. If the initiative proves successful, you will see IDCOL taking initiatives in this area in the future.

In addition, we have undertaken some R&D projects on hybrid cold storage systems. Work is underway to develop an economic model for these systems. If successful, we will consider promoting such projects at growth centers across the country. ■

GAS CRISIS LEADS TO NEW INITIATIVES

The latest news is good. The gas supply has returned to the level that existed before the July 21 easing a crisis that severely affected industrial production, electricity generation and kitchens for two months. Regasification of imported liquefied natural gas (LNG) increased to nearly to the regular volume on September 15 after the full operation of two FSRUs (floating storage and regasification unit) located at Maheshkhali in the Bay of Bengal. According to the Daily Star newspaper the total gas supply reached 2,610 million cubic feet per day (MMCFD). The volume breaks up as 990 MMCFD from the two FSRUs –one operated by US company Excelerate Energy and the other by Bangladesh's Summit Group – and 1620 MMCFD supplied

from the country's own gas fields. The volume of gas supply was at 2,600-2650 MMCFD before the July 21 disruption. At that time the LNG terminals has been handling 1,000 MMCFD of LNG.

It has been a collective sigh of relief. Factories have started receiving gas, the electricity generation has improved, while the pressure of cooking gas is also showing some improvements. All have suffered a lot for the two months. This has been a welcome development, but the crisis of gas supply is far being resolved. With the domestic supply of natural gas declining Bangladesh's dependence on imports of the fuel is increasing. The supply of LNG from Qatar has been disrupted for about six months due to the US-Israeli war on Iran.



The July 21 accident at one of the two existing FSRUs has exposed a weakness that should have been taken care of much earlier. Two terminals for storage and regasification are not enough considering the demand.

Bangladesh has now signed a deal with the United States to buy 117 cargoes of LNG through 2038 amid criticism it will be pricier from the gas purchased from Qatar and other sources. There was a time when Bangladesh worried little about the supply of natural gas as its domestic production was good enough with a healthy reserve.

Currently, Bangladesh produces around 1,600 to 1,620 MMCFD of natural gas, far short of the total national demand exceeding 3,800 MMCFD. The daily gas between the demand and the supply is estimated at 1,200 MMCFD. This has

Reverse Swing



Farid Hossain

meant adoption of a policy to meet the deficit through imports through government-to-government deals and direct spot purchase. This policy has been under scanner since its adoption. The problem with the imports has been the availability of gas when the country needs and the volatility in price. First the Covid-19 pandemic and then the Russia-Ukraine war and now the ongoing US-Israeli war on Iran have made Bangladesh to suffer. The problem is showing no sign of easing with Iran-backed Houthi rebels intensified their attacks on Saudi Arabia affecting shipment of ships through Bab-el-Mandeb, a waterway crucial for trading. Not only is supply disrupted, but the price of oil has shot beyond \$110. Covid-19 is gone, but not the wars. With the conflicts raging Bangladesh, like many other countries, are getting the hit really hard.

The July 21 accident at one of the two existing FSRUs has exposed a weakness that should have been taken care of much earlier. Two terminals for storage and regasification are not enough considering the demand. Technical faults, accidents and even natural disasters can cause heavy disruptions as had been the case recently.

So the new government BNP is making fresh moves. It has decided to build three more LNG terminals to boost supply of gas to the national grid with priorities given to industries and electricity generation. Three of the terminals will be floating and two land-based. One of the three FSRUs will be located at Kutubjom in deep water off Maheshkhali under a government-to-government arrangement. This Cabinet committee approved the proposal on July 28 and the terminal will be built by a Chinese company. Besides, the government has decided to drill another 150 wells in the renewed search for gas from the domestic sources. 

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