

**Introduction to Law on Electricity**  
**Professor Uday Shankar**  
**Rajiv Gandhi School of Intellectual Property Law**  
**Indian Institute of Technology Kharagpur**  
**Lecture 22**  
**Trading**

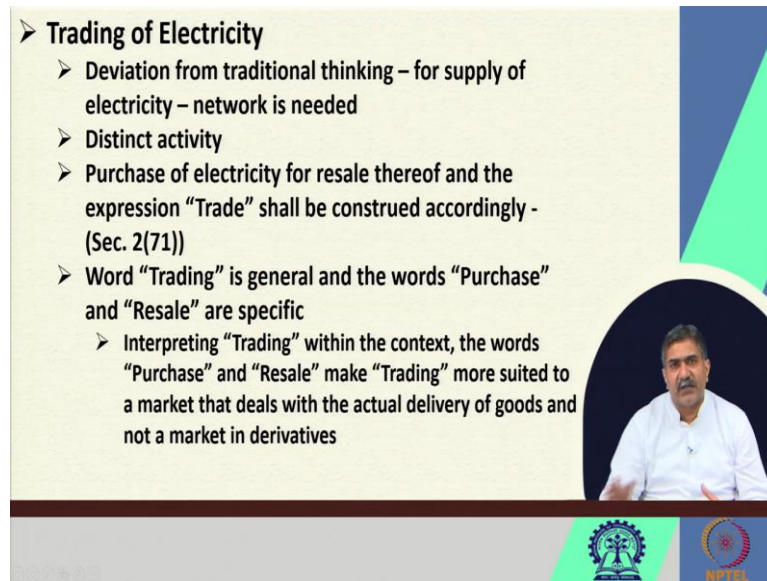
Greetings to all of you. We have studied the significance of open access. We have also studied that how the issue of cross subsidy influences the very idea of open access. Now, let us look at another remarkable feature of the Electricity Act, i.e., trading of electricity.

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So, today we will discuss about trading; what is the legislative scheme of it? What are the benefits of trading? And we will also see that how the matter was dealt by the court?

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➤ **Trading of Electricity**

- Deviation from traditional thinking – for supply of electricity – network is needed
- Distinct activity
- Purchase of electricity for resale thereof and the expression “Trade” shall be construed accordingly - (Sec. 2(71))
- Word “Trading” is general and the words “Purchase” and “Resale” are specific
  - Interpreting “Trading” within the context, the words “Purchase” and “Resale” make “Trading” more suited to a market that deals with the actual delivery of goods and not a market in derivatives

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Now, if you can recall, I discussed while explaining the salient features of the Electricity Act that what all activities are licensed and what activities are delicensed. In that, I have drawn your attention that trading is now being acknowledged as a distinct activity under the Electricity Act. It is a separate and distinct activity from the rest of the electricity industry, i.e., generation, transmission and distribution.

So, there was a traditional understanding that the transport of electricity is to be done in a very conventional set-up, where there is a network of the transmission utility, generating units are using that to supply the electricity to the distribution licensee, and distribution licensee have its own network, and there it is fulfilling the need of the end consumer.

This is what is a sort of conventional traditional way of looking at the supply of electricity, which is based on the very existence of network. Without network, it would be very difficult to transport electricity from one location to another location, and thus without the network, there cannot be any buying and selling of electricity.

Now 2003 Act has looked beyond it and conceptualized a situation where buying and selling of electricity can very well take place even without the involvement of the one who owns the network. Otherwise, as I said in conventional thinking, it is essential to involve the one who owns the network.

But then it was suggested under the 2003 Act that let trading be also considered as a regulated distinct separate activity and how is trading defined under the Act; If you look at the definition given under section 2 subsection 71, it says; purchase of electricity for resale and accordingly we need to understand the significance of the term trade.

So, trade here need not be understood in terms of all futuristic components which involve in the trade. The word trade here is to be drawn its references from the other two expressions which are used that is purchase and resale. Why this? Because we know very well that electricity as a product, as a commodity is to be sold and to be consumed in a very instantaneous manner. It is something which cannot be stored.

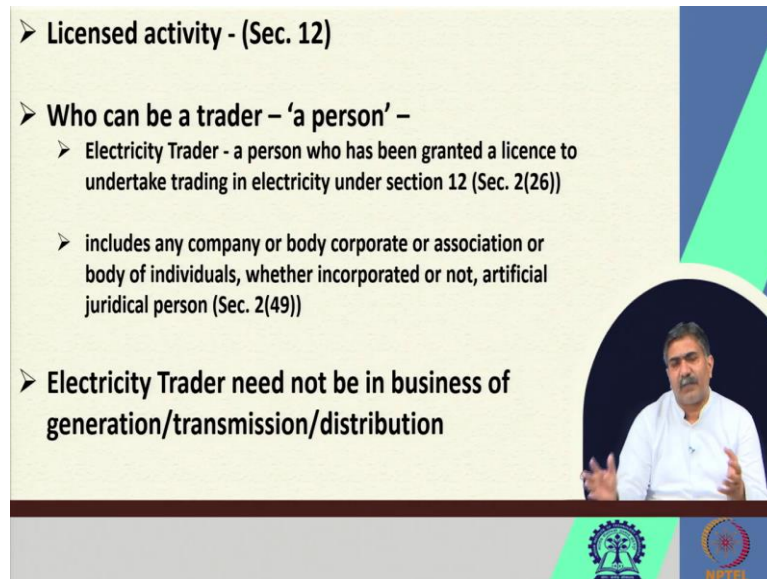
So, if some buying and selling is happening in this sector, one has to always keep this in mind that this buying and selling is happening in such a manner, so that the electricity is getting consumed and that is why it says about purchase and resale. So, derivatives may not be brought within the definition of trading.

Though there are debates going on this, can there be trading of derivatives in electricity, if possible, who shall have the jurisdiction? Whether it will be the forward marketing commission which shall have the jurisdiction, or it will be CERC which will have a jurisdiction? These are prominent pondering points in this regard.

But then one thing we need to understand that through this provision what the lawmaker intended to achieve is that; the electricity as a commodity is to be traded like any other goods, the way any other goods are being traded in the market, something similar has been envisaged, something similar has been conceptualized even for electricity, that electricity can be traded like any other goods.

Now the question is that should it also be the case with regard to derivatives in electricity? That is a point of debate that is something which we need to look at, how the reconciliation happens between two regulatory bodies, SEBI and the regulatory commission.

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➤ **Licensed activity - (Sec. 12)**

➤ **Who can be a trader – ‘a person’ –**

- Electricity Trader - a person who has been granted a licence to undertake trading in electricity under section 12 (Sec. 2(26))
- includes any company or body corporate or association or body of individuals, whether incorporated or not, artificial juridical person (Sec. 2(49))

➤ **Electricity Trader need not be in business of generation/transmission/distribution**

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So, section 12 talks about licensed activities under the Electricity Act and in that, you would find that trading is one of the activities enlisted as a licensed activity in addition to transmission and distribution that is what has been indicated and who can be a trader? It says a person who has been granted a license to undertake trading in electricity is a trader.

So, with this definition, you can very well visualize that the electricity trader may not be connected with any of the activities which are traditionally understood as a component of power market. He can be a person who has nothing to do with generation, he can be a person who is not at all involved in transmission, or he can be a person who has nothing to do with distribution license. He can very well be independent of all these activities. The only thing what it says is that that he must have a license to undertake trading. So, you can very well imagine, you can visualize the way the lawmakers have started liberalizing the power market by introducing a unique entity to play phenomenal role in the growth of power market. And a person here as per section 2 subsection 49 need not be a natural person. Person here can be a company, can be a body corporate or association or a body of individuals, whether incorporated or not, or it could be artificial juridical person.

What this definition signifies? This definition signifies that trader need not be an individual, need not be a natural person. He can be a juristic person also, and the way we understand the meaning of juristic person under the law, what it means that it is an artificial body which has been entrusted with rights and responsibilities under the law and it has independent identity

from the one who has created it. So, it has its own seal, it can be sued, or it can sue; that is what we read about juristic person in the legal discipline.

Now, because the trader has been entrusted with the responsibility to bring in competitiveness in the market because trader is required to create a win-win situation for the buyer and seller. You would find that there is a prohibition under the law that the trader should not be in a business of generation, transmission or distribution.

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- **Certain entities are exempted from taking licence**
  - Distribution licensees (Proviso 9 to Sec. 14)
  - CG/SG (Proviso 3 to Sec. 14)
  - any local authority, Panchayat institution , users association, co-operative societies, NGOs or franchisees – notified by CERC
- **Requirement the entity should fulfill for being an electricity trader – to be determined by App. Commission (Sec. 52)**
  - technical requirement
  - capital adequacy requirement
  - Credit worthiness for being an electricity trader
- **App. Commission shall endeavor to promote the development of power market (Sec. 66)**

So, the law categorically indicates that conflict of interest is something which must be avoided. There should not be any conflict of interest, and that is why it is suggested that transmission utility should not be allowed to trade, categorically indicated in the Act that transmission utility should not be allowed to trade. Then, it is also indicated that distribution licensee need not go for obtaining a license.

Now certain entities are exempted from taking license. One is distribution licensee; under section 14, 9<sup>th</sup> proviso, it says distribution licensee need not go and obtain the license and need not apply for the license. They shall be presumed. There shall be a presumption that they do have a license to trade because, for that matter, if distribution licensee enters into trading, it will open up new avenues for the licensees to generate revenue to earn revenue.

On a similar line, central government and state governments are being asked to not to obtain license, they shall also be presumed to have license under section 14 third proviso, and then

local authority, panchayat, users' association, cooperative societies, NGOs or franchisees, if they are notified by CERC then they also need not take the license.

The idea is, why this set of bodies are exempted, so that the speed of electricity happens in a very faster pace. Remote areas need not remain dark because of the non-investment. So, there is a possibility when you can allow this set of bodies to trade, perhaps, in turn, they will contribute in the growth of market.

But traders who are taking the license, they need to fulfil certain criteria, and one is certainly the technical requirement; that is what they need to fulfil. They need to also have enough capital to be in the market and also credit worthiness for being an electricity trader.

So, these requirements are to be laid down by the appropriate commission that what all conditions are needed for giving the license to the applicant. And then, you have the responsibility of the appropriate commission to promote the development of power market, which we shall discuss in detail in the next session, that what is this power market, how it operates and all. So, trader needs to comply with this technical requirement.

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The slide contains the following text:

- **Who are not allowed to trade –**
  - Load Despatch Centres
  - Central and State Transmission Utilities
  - Transmission Licensee
- **Not allowed to trade – to bring in competitiveness by removing conflict of interest**
- **Trade will bring benefits –**
  - **Generation –**
    - more avenues to sale electricity
    - Better efficiency with increased plant load factor
    - Increased utilisation of resources

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Why? Because as we have read, grid discipline is very important because that adds to efficiency and quality. Therefore, it is important to see that traders are having well equipped with technical specification suggested by the commission. Now as I said to avoid conflict of interest, load dispatch centers, transmission utilities, they are not allowed to trade. They cannot trade.

And not very difficult to visualize that if you allow transmission utilities, load dispatch centers, system operators to trade, then they would be preferring one or the other players in the market. They will not be able to play the neutral role alone.

So, if competitiveness is the mantra, if the lawmakers they thought that it is competitiveness which will bring in parity, which will bring in fairness, which will bring in reasonable pricing, then conflict of interest must not be allowed to operate. And that is the reason it is clearly indicated in the law that let system operate a transmission utility is not be part of trading at all. Otherwise, they will have a very obvious interest.

They will identify when there is peak demand, and accordingly, they will influence the pricing mechanism or where there is a possibility to get surplus electricity. So, all these are to be avoided when you make this mandatory that these entities are not to be allowed to participate.

Trade in electricity benefits all the players. For generating units, you would find that they do have a benefit of optimally improve the capacity of power plant, because these are capital intensive industry to establish power plant requires lot of money. Then, if there is no buyer of the electricity, obviously, they will have to scale down the production.

So, trading presents an avenue to the generating units to sell electricity. It need not be seen only in terms of selling electricity, which is being generated in surplus. It is also an opportunity for looking at the market from where reasonable price can come for the production; need not be always a case of surplus, there is a surplus, and therefore, you need to trade. The whole orientation of the market can get changed, and then trading would also help the generating unit to utilize the resources in a much better manner. The power plant need not remain idle.

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- **Transmission**
  - Better grid discipline
  - Improved utilisation of transmission capacities – more revenue for operation and maintenance
- **Distribution**
  - Reliable and quality supply of power
  - Reduction in cost through time of day trading
  - Gradual reduction in surcharges
- **Consumer –**
  - No shortage of power
  - Low cost electricity
  - Mitigating environmental degradation – by full utilisation of resources by power plant

It is good for transmission because it would promote grid discipline. It will ensure that the transmission network, transmission system is being utilized in a very efficient system. And if transmission system is operating efficiently, obviously, it will enhance the scope of earning revenues for the utilities. And if there is greater earning opportunity, obviously, it will help in upgrading the infrastructure.

Same is the case with the distribution, and when you look at the distribution, you would find that distribution can very well serve its customer by getting a reliable supply of electricity. If distribution licensee has some demand from the end-consumer, it can meet, and then there is a possibility of getting the electricity on a reduced cost.

Reduced cost meaning thereby that the cost which is being finalized for the day when the trading is happening. And obviously, it leads to gradual reduction of surcharges which we have discussed in the last class that how the surcharge is creating sort of barrier in facilitating the growth of the market.

It certainly benefits the consumer because then consumer will have no shortage of power. It will benefit the consumer by getting the electricity on a lesser price. And when you look at the larger perspective, it also aligns with the mission of a clean and green drive to procure energy, produce energy, or to minimize the dependence on fossil fuel, because if the thermal based power plant are working as per its capacity, then certainly it is not adversely causing



environmental degradation by remaining idle. So, overall, it appears to be beneficial to all the players operating in this.

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➤ **Factors promoting Trading – Surplus could lead to trading opportunities**

- Source of generation – hydro/renewables – high generation depending upon weather/season
- Demand of electricity is seasonal and weather sensitive – high demand in peak winter and summer
- Surplus electricity from captive power plant

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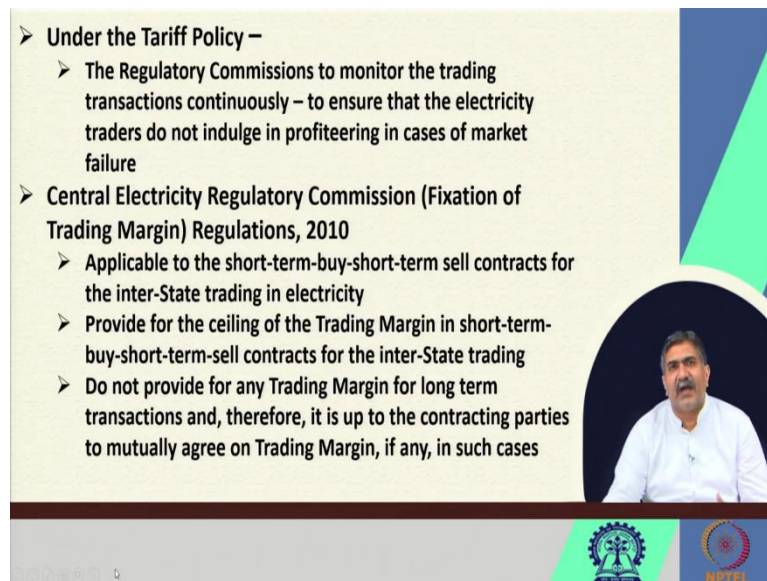
Now, what are the factors which shall promote trading? One is when you look at the generation pattern in India; you would find that it is not very symmetrical. And you have a different energy mix in India, and that results into generation of electricity in a different scale, in a different timeline. Hydroelectricity may get better output when you have a good rainy season. Solar may get better output when you have good clear sun, and this, in a way, helps in having a situation of surplus electricity in the market.

You can imagine that in the absence of trading as an activity, the entity would not like to produce surplus, because electricity is one commodity, as we have been telling is to be consumed instantly. So, if there is a known mechanism to utilize surplus, it will go waste and it will not go only waste that surplus will also, without any mechanism will, cause disturbance to the grid.

So, with the trading, there is an avenue for selling that surplus electricity. So, you have a different source of generation in India, and then there is also a possibility of utilizing those sources to meet the demand of the consumer. In wintertime, when there is a peak demand, there is a possibility of pulling in electricity from hydro. In summer, when there is a peak demand, there is a possibility of getting electricity from renewable solar.

So, this arrangement is there. Same is the case with the captive power plant. We have read that captive power plant is now allowed to surplus electricity. So, in that way, captive power plant would certainly utilize the capacity to generate surplus, if there is a market where it can sell the electricity.

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- Under the Tariff Policy –
  - The Regulatory Commissions to monitor the trading transactions continuously – to ensure that the electricity traders do not indulge in profiteering in cases of market failure
- Central Electricity Regulatory Commission (Fixation of Trading Margin) Regulations, 2010
  - Applicable to the short-term-buy-short-term sell contracts for the inter-State trading in electricity
  - Provide for the ceiling of the Trading Margin in short-term-buy-short-term-sell contracts for the inter-State trading
  - Do not provide for any Trading Margin for long term transactions and, therefore, it is up to the contracting parties to mutually agree on Trading Margin, if any, in such cases

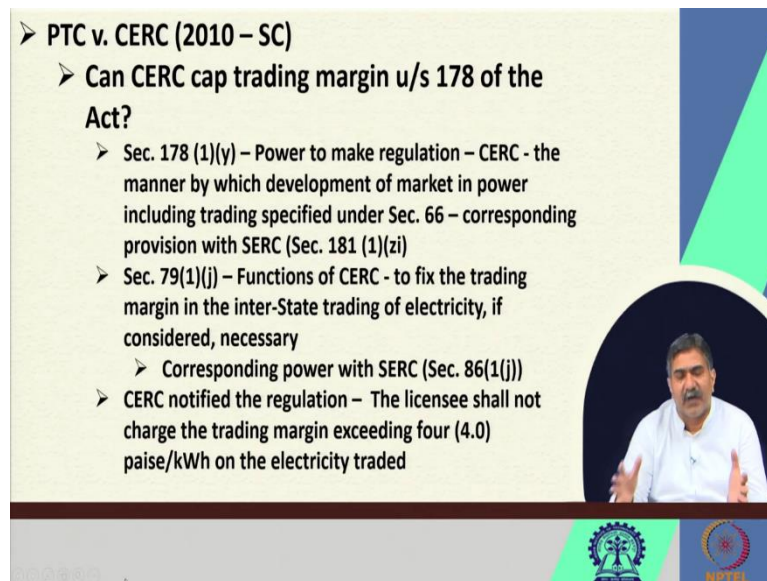
When you look at what are the arrangements which are being done to facilitate trade, you find that tariff policy says that it is the responsibility of the regulatory commission to monitor trading transactions. So, it is a sort of regulated activity to ensure that the one who are engaged in trading, they are not unnecessarily profiteering.

They are not engaging into sort of arm-twisting. That there is some peak demand and then take benefit of that peak demand and try to sell the electricity on a higher cost, responsibility of the regulatory commission to do an oversight job. In this regard, in 2010, Central Electricity Regulatory Commission came up with this fixation of trading margin, where sort of guidelines being laid down for short-term buy, short-term sell contracts for interstate trading electricity. Obviously, for intrastate, it is the state regulatory commission which shall have a responsibility.

So, this 2010 regulations prescribes the sealing of the trading margin in short-term buy, short-term sell contract, and it does not provide any trading margin for long-term transactions. For

long-term transaction, it is for the parties to agree, contracting parties to agree that what shall be the trading margin.

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➤ **PTC v. CERC (2010 – SC)**

➤ **Can CERC cap trading margin u/s 178 of the Act?**

- Sec. 178 (1)(y) – Power to make regulation – CERC - the manner by which development of market in power including trading specified under Sec. 66 – corresponding provision with SERC (Sec. 181 (1)(zi))
- Sec. 79(1)(j) – Functions of CERC - to fix the trading margin in the inter-State trading of electricity, if considered, necessary
  - Corresponding power with SERC (Sec. 86(1)(j))
- CERC notified the regulation – The licensee shall not charge the trading margin exceeding four (4.0) paise/kWh on the electricity traded

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Now, Supreme Court has answered an important question that can Central Electricity Regulatory Commission cap the trading margin? Can there be a capping done? Can there be a sealing done? The court looked into the power to frame regulations given under section 178 subsection 1 clause y, where CERC has been entrusted with the power to make regulation. Where it says that regulations can be made by the regulatory commission to promote market as one of responsibilities given under section 66, and similar it is the case with the state regulatory commission. They also do have a responsibility to frame the regulation.

And when you look at section 79, which talks about power and function of the commission, one of the functions given is under clause j is to fix the trading margin in interstate trading of electricity if considered necessary, and similar power is also there with the regulatory commission at the state level.

So, regulatory commission does have a power to frame the regulation involving trading margin, and the licensee shall not charge trading margin, which is been notified by the regulator. Because the idea is to promote the market, the idea is not to leave the players of the market to decide the rule and ultimately causing distortion in the market; that is not the idea.

And therefore, it is well within the power of the commission to frame regulation. Framing regulation is similar to sub-delegation. It is similar to delegated legislation. So, this legislative

power has been entrusted with a very defined objective. Defined objective is to fulfil the objective laid down under 66 of the Act.

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➤ **Held:**

- Regulations can be made by the Commission – independent of the power conferred to 'fix' margin u/s 79
- Trading margin being the component of the final price paid by the consumers required regulation to protect the consumers
- the decision-making and regulation-making functions are both assigned to CERC
- Tariff regulation, licensing (including inter-State trading licensing)- mandatory function of the Commission
- If the regulation is being made – the mandatory function must be in compliance with the same
- Regulation – is a legislative function

And therefore, the supreme court has said that the regulation which the regulatory commission would be making under section 178 that is independent of section 79. Trading margin is about the component of final pricing to be paid by the consumers. So, regulation is being made to protect the consumer. What shall be the pricing of trading? How this, that is for the traders to do. That is for the buyer and seller to decide, but then it is important that the regulatory commission comes up with some overall rule of the game.

So, under section 79, regulatory commission decides by fixing the margin. Under section 178, regulatory commission is entering into a legislative domain and framing a regulation to regulate the power sector. So, it is not necessary that there has to be a regulation for exercising the power under section 79, no. But then, if there is a regulation made then it is mandate. It is bounded duty to follow the same. So, regulation is a legislative function that is what it says.

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➤ **Solar Energy Corporation Ltd. v. Ministry of New and Renewable Energy (2019 – CERC)**

- The petitioner had prayed for adopting the trading margin of Rs. 0.07/kWh
- **Held:**
  - With respect to the Trading margin, the Act read with the Central Electricity Regulatory Commission (Fixation of Trade Margin) Regulations, 2010 gives freedom and choice to the contracting parties to mutually agree on the Trading Margin for any kind of long term trading transaction
  - Accordingly, the Commission cannot adopt any Trading Margin for long term transactions under the Trading Margin Regulations

Then, you have another case where the petitioner, in this case, had prayed for adopting a trading margin of 0.07 kilo per watt-hour. Now, in this regard, the court has said that as far as fixing of trading margin is concerned, it is the contracting party who are doing it.

What the regulation does is that regulation simply gives an overall framework that how the trading shall operate. For individual cases, it is for the contracting parties to decide on the trading margin. So, that is what the court has said; that is what the order of the commission said in this case of Solar Energy Corporation versus MNRE.

Where the commission has said that the 2010 regulation gives complete freedom and choice to the contracting parties to mutually agree on trading margin for any kind of long-term trading transaction. Commission does not adopt any trading margin for long-term transactions. It is for the parties to look at it. So that is what the court, that is what the commission talks about the role of the commission in fixation of trading margin in regulating the trading activities. Thank you very much.