Inclusion and Technology Design
Prof. Amit Prakash
Centre for IT and Public Policy (CITAPP)
International Institute of information Technology, Bangalore

Lecture - 11
Inclusion in designing ICT for Development projects: Who [should] matter?

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Let us say we will make a claim like this is not only because of this particular study that somebody is doing, but few other the studies that some of us have been concerned with for the last few years including land record computerization which started in India about 20-25 years back much before electronic market places. And, land record computerization is oblivious to the need of tenant farms, it is oblivious to the need of landless farms right.

So, what we are trying to understand is whether existing approaches to designing digital technologies for use by the Indian state to address development concerns. So, the concern of low income of in rural areas is a development concern because it has economic consequences. It has social consequences of distress migration and various other things leading to broken families, leading to various other ways in which societies may suffer.

So, the symptoms that we are getting is that the approach to designing these technology is that approach to using ICT's for achieving development and governance outcomes by

the Indian state. But, by various other state led state base agencies in similar countries they demonstrate this element of elite capture.

So, a electronic market place or electronic agricultural market place or commodity exchange would be in the agricultural hierarchy much easier for a larger farmer with more assets, with more capacities, with more risk taking abilities to participate in than a smallholder.

So, from that perspective may be a designing a technology solution like this you probably looking at that group of farmers who already have incomes which are on per with average national incomes right. So, they are probably better off in terms of the new transformation that ICT's are trying to bring about. So, that is the concern that we want we want to work on and work in addressing through our design of technology ok.

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So, let us let us go back to governance, we will just forget about technology for the time being we will go back to governance. So, what are we talking about in terms of governance today yeah. So, our mantra for governance in the country is 'Sabka Saath, Sabka Vikas which as per the website as per the prime minister's website translates to collective efforts inclusive growth.

So, growth in economic say outcomes a needs to be inclusive which means distribution is our concern distribution needs to be engaged with and that growth needs to come about through collective efforts.

So, we do not want a few people to contribute to that growth, we want the growth to come about by collective efforts right. So, that is what we are trying to do we are we are talking of in terms of our governance reforms we talk accountabilities, we talk of participation. So, participation is also something that we have been talking about. Active participants in the governance process, we talk of a countable administration. So, these are some of the terms that are important for us as a nation in terms of realizing our development conditions.

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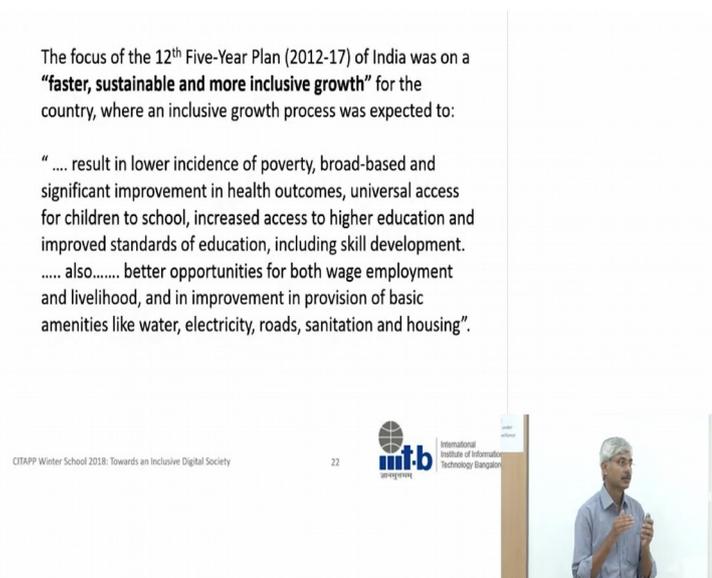
The focus of the 12th Five-Year Plan (2012-17) of India was on a **"faster, sustainable and more inclusive growth"** for the country, where an inclusive growth process was expected to:

" .... result in lower incidence of poverty, broad-based and significant improvement in health outcomes, universal access for children to school, increased access to higher education and improved standards of education, including skill development. ..... also....... better opportunities for both wage employment and livelihood, and in improvement in provision of basic amenities like water, electricity, roads, sanitation and housing".

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It is not exclusive to the current dispensation in the centre, the earlier government when the five year plan used to exist also talked about faster sustainable and more inclusive growth. So, the reason to believe that inclusion in our growth process is something that we all value as a nation and other society. So, if we were to engage with something like that where do we where do we reach out too far theories that can help us.

ently. An objective, which combines participatory democracy for the people, especially the poor people of our country, with a high rate of pro-poor growth sustained over time. In other words, we are in the race of giving human dignity to all our citizens by bringing economic and political democracy closer in the shortest possible time. This must not be misinterpreted as a race

The essence of a participatory democratic process in development lies in our ability to define an economic role for the poorest and the most disadvantaged, both as a producer and as a consumer. The poor would not be the passive receivers of doles, but active contributors to the process of development. Our mindset must be changed

Source: Bhaduri (2006)

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What I have been looking at off late is this economist by the name Amit Bhaduri, I am sure some of you would have read his books. What he is talking about is in terms of our political ideologies a market led capitalism and the state led socialism need not have worked. So, we have no reason to believe that a market led capitalism has worked in India. We have no reason to believe that a 6 state led socialism will work in India check it across the world it has not.

So, we have instances that market led capitalism gives rise to more inequalities that a state led socialism gives rise to inefficiencies of breaking down of states failed states all that, the models that have been followed. So, is there a is there value in bringing them together, can we bring elements of market led capitalism and can we bring elements of state led socialism together. So, what is it that we can borrow from a market led capitalism market. So, what has worked in India has been political democracy. What we pride in terms of having achieved more than 70 years is a stable democracy.

So, any say accomplishment that any any say independence day speech we will talk about India has been important in terms of maintaining and sustaining a vibrant political democracy right. And, a vibrant political democracy is what a market led capitalist structure, as provided us for what it advocates right. What is it that we can borrow from the state lead socialism model? A state led socialism model allows us to breaking

collective efforts in production. It does not privilege certain individuals or certain factors over others in terms of production. So, it does not privilege capital over labour.

So, it does not privilege those who sitting in that the large field in Mumbai over those who have producing paddy to cook right. They tries to bring collective efforts in terms of producing. Now, what Bhaduri is trying to say is can we look at political democracy and can we manage political democracy with a production process that is more inclusive, that employers collective capabilities in terms of how it is reproduced right.

Because, something like that would be useful in terms of in terms of looking at a high rate of or looking at issues of inclusion in our growth processes. We want people to be involved in production, we want them to be involved we want them to participate in the way growth is happening in terms of economic outcomes.

So, what is advocating is sorry we need to look at the poorest and the most disadvantage in this case the small holders as a producer and the consumer. And, we need to value them on earth for producing not only for consuming, but also for their abilities to produce right.

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And, this is what he says can lead to development with dignity for people and development which is the appreciative of dignified living for all human beings and that is something that the SEG's state wants us to do. That is something that our governance

priorities want us to consider and that requires a greater participation of people; especially those who have been marginalized because of their gender, because of their physical abilities, because of the social and economic status to participate in both production and consumption. Ok. So, so that is one thing quickly we did not stop moving this.

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- If Digital Technologies were to play a role in achieving the Indian State's agenda of Development and Good Governance [and, SDGs in general], the design approach [and, production logic] will have to change
- Designs will have to be more appreciative of local contexts, people, their needs and their rights and entitlements

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Social Shaping of Technology

- Influenced by a desire to democratise technological decision-making; subject it to forms of social accountability and control
- Concerned with exploration of possible implications of different choices within and during technological development
- SST research investigates ways in which social, institutional, economic and cultural factors shape:
  - the *direction* as well as the rate of innovation
  - the *form* of technology: the content of technological artefacts and practices
  - the *outcomes* of technological change for different groups in society

Williams and Edge (1996)

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There was a notion in terms of in technology studies we just called social shaping of technology and that is that is reinforcing technology as a political actor claim that I was

making which says that technologies are socially shapes. They do not follow any inherent economic or technical logic which says that this is the only part that technologies will take in their evolution. Technology evolution happens because of various social process and because various social process interact with enunciate technology right.

It is concerned with the direction of technology, it is concerned with the direction of innovation. It is concerned with the form of technology, the content of technology artifacts and it is concerned with the outcomes of technological change for different groups in society. So, this is a technological position or this in a position that [is/are] are coming to us from technology studies literature, from the economics literature development and dignity is something that as allows us to consider individuals who have been marginalized from various aspects of economic or social activities to become more active producers and not only remain passive consumers of whatever of governance should forms of technology etcetera.

So, if we were to combine both with them, what we are saying is if technologies were playing a role in achieving the Indian states agenda of the government generally the global community's agenda of sustainable development, the design approach and production logic needs to change. There is no reason and it can; so, technologies are not deterministic right. Technologies can be shaped by society right and we know we have reason to believe that the direction in which this technology is leading us to may not be what we want or may not be where we want to go. So, we have reason to then question the direction and say that the logic of producing ICT's need to change right.

And, how should it change? Something that has already been talked about in the earlier sessions, designs will have to be more appreciative of local contexts, people, their needs and their rights and entitlements. We need to engage more and more like people, we need to engage more and more with people and their rights. So, if people have a right it is different from welfare, it is different from charity.

So, a right is something that I can claim, a charity is something that I will request. Therefore, we have a right people have a rights, we have right to education, we have right to employment, we have a right to livelihood. We have so, many different rights as citizen and if we need and we need to be aware of those rights of individuals. And, we

need to incorporate all these rights and their entitlements in the way we design technology.

Student: We would just restrict rights to do state given right or constitution needs refinements or we have product.

So, how you otherwise you define rights? Rights are.

Student: So, some in the states state regard explicitly that is not explicitly can your right to livelihood is that a right at direction still we.

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Student: Just if the wherever we have just (Refer Time: 14:23).

No ok, in that case that right need not be effective, it is not a the question is right is that the state needs to protect that right. So, it needs to at least acknowledge that this is the right and if that right is being enforced it is not a charity on the settlement.

Student: sure.

So, PDS for example, it is not a charity its because it is a vehicle to enforce right to food. So, as citizen I have right to full security. So, I claim that right from the state, the state is not doing a welfare or I or you as a tax payer I am not doing a welfare to me if I am getting subsidized ration from the fair price shop. It is my right as a citizen which I am trying to have.

Student: Extending that example how that is in not entitled because not everybody.

So, rights protect entitlements.

Student: Can we stand back a little bit, I mean the right is to get with (Refer Time: 15:26) under the constitution. So, rights (Refer Time: 15:28), but as we rights if you expand them you have to right to food security, rights within that means, you may you may be getting the nutrients and a food you need with the quality, know and a rights through as consequence of. So, we if you take right as a constitutional right embedded for all citizens who respect you know who they are then you would have unpacked that (Refer Time: 15:54) rights to rights within and rights as a results of there is full I think.

Correct. So, I am more or less done do we have hope doing all this where does hope lie. Do we have any hope with ICT's with wherever we are? Any examples that come to your mind, can it actually be done? So, one of the powerful examples that I have come across in our context over the last 100 years, it has been this.

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This is the image of a charaka here Gandhiji. So, this to me symbolizes a lot of what we are trying to deal with at this form.

Student: (Refer Time: 16:47).

,It is simple, it is not a very difficult in terms of operating right. It was able to assimilate a lot of context right. It was not and it was able to assimilate a lot of context socio economic cultural context right and in terms of impact it had; and who was it fighting against? It was fighting against?

Student: Machines.

It was fighting against the big capital driven machines in Manchester right, but then it was able to achieve something that was quiet dramatic. So, in terms of impact this was able to bring about a change that was at the level of the grass roods, that was at the level of a individuals which did not privilege production; it democratized production. So, I am producing, the village is producing and I value that production, yeah but I have not only a consumer of cloth being produced in the mills, but I am producing the cloth right. So,

that we may probably want to look at a variant, IT variant of the charaka to address all the concerns that we face in terms of technology explosions right.

So, let me leave you with that I am sure this may this may kind of arouse extreme passions or extreme say reactions. But, I leave you with that reaction maybe you can think over it, we can discuss it over coffee. And, you are most welcome to not agree, to have your own positions because that is what the intention is; that we should be aware of what position we are trying to take and we should be confident and brave enough to take that in our designs.