

Plastic Waste Management
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Lecture - 17
Plastic Bans - Global Examples

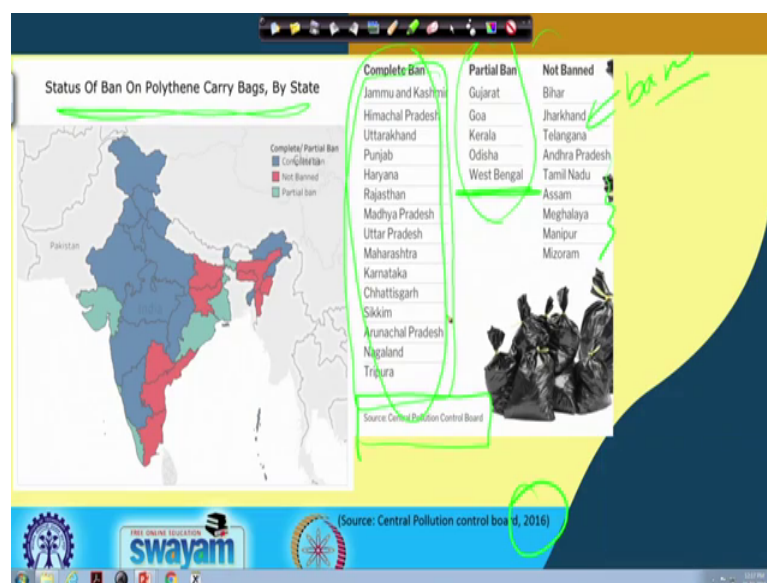
So, welcome back. So, we discuss, we have been discussing the bans, the plastic bans. So, we looked at the Indian scenario, we talked about the Maharashtra ban. And we will talk little bit more about the Indian scenario, then we will get into the global example. So, in this particular video, the focus would be more on the global example little bit of Indian scenarios are still left from the last discussion, so which will continue and then get into the global example.

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Just to recap in this week, we are focusing on the plastic ban global examples, China's Sword policy and the impact on global plastic waste management. This is the weekly concept that is going to cover in this particular week.

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So, looking at again the example, from India from our country, we have there have been lot of bans. Maharashtra is what we looked in detail just in the last video, but there are a lot of bans happening in India in terms of there are some complete ban, there are some partial bans and there is no ban is also there. So, in terms of no ban this data again is 2016. So, Jharkhand has banned now. So, Jharkhand already have a ban in place and some other states also have some sort of ban in place probably for the last one year. They are also coming up with some ban. So, there are but there is some states which has complete ban like JK, Jammu and Kashmir, Himachal Pradesh, Uttarakhand, Punjab, Haryana, Rajasthan, Madhya Pradesh, Uttar Pradesh, Karnataka, Chhattisgarh, Sikkim. So, as you can and this is the source is the central pollution control board from their report from their website.

So, this is on the ban on polythene carry bags. So, it is a, so when they say complete ban means no polythene carry bags, partial ban it depends on the size of the bag and also the thickness of the bag and not ban means where it is of course, it is you can easily available. But as you can see, many of you will probably come we have several thousand students in this particular course. So, many of you will come from this state. So, we would like to hear on your experience in terms of how much of that ban is really working in your state in terms of single use plastic bags, carry bags which you which, this is the bags that we are referring to on what you get, when you go for a buying the potatoes or onions and like a jalebi, samosas all those that thin carry bags or you go for meat that

black color bag whether you are whether the bags are is still available in your in these states or if it is just not available. Based on some of the travel that I have done, in fact, some of these states it is kind of a news for me that there is a ban because I could see those things available said. But maybe I would like to hear from you like what you think about these bans is it really working in your state.

And then, there are some partial ban we are recording this at West Bengal. So, this says partial ban. So that means, less than 40 micron should not be available. It is not available in our campus now, but if you just go outside the campus, it is available it still. So, that is so, that means that it is at least it is not working in this particular town a where we are where we are recording this at IIT Kharagpur is basically Kharagpur town. At campus, we have certain ban in place for last few months and hopefully it will work, let us see.

So, again we have to provide in the campus, we have tried to provide some alternatives. So, that is which is around a little bit expensive, but people are people have to because since the other bag is not available, if they do not bring their own bag, they have to buy those alternative bags. So, there are some bans in place, different states and different scenarios a different level right now, but there are there are some bans in place already.

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So, and there was some recent, this is just a news came very early of this year January third 2019 where it says that Indian states implementation of plastic ban is a mixed bag. So, for example, this says Tamil Nadu is the latest state which was not there if you

remember from the previous slide. Tamil Nadu is not there but now the Tamil Nadu is also in that ban. So, ban the single use plastic. So, if you look at the fourth state in India to implement a ban on single use, although it is in recent times. Maharashtra did it on March 2003 other, then Himachal Pradesh in July but for most Indian state almost all have banned plastic bags. So, there is a there is a bag as you can see from the previous list.

Uttar Pradesh and Karnataka is also banned single use plastic but they have not used that term. Karnataka certification came in 2016, UP banned in August 15, 2018. Sikkim was way ahead which was the only when it comes to plastic bag in 1998. In 2016, they banned even the use of plastic bottles, styrofoams, thermocol to displace plates and cutlery not a blanket single use plastic ban. The Bihar government now also banned it Bihar ban was confined to use of plastic carry bags. Andhra Pradesh made a similar announcement did. As did it Assam and Meghalaya, also Odisha ban polythene bags pet bottle of less than 500 ml capacity, single use plastic cutlery and thermocol decorative item. So, as you can see, even from the previous list, all the stuff that was not most of these states have also now banned plastic.

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So, there is a lot of, we have to see how these bans are coming, how it is really working on ground and for that I need your help in terms of educating us, in terms of how the ban is really working. Now, looking at the global scale, here again there are different types of

ban as you can see there is some full country ban, there is some partial ban and ban not yet implemented, but he still been thought about. And there is a it taxes charges or other measures is what taxes, they are charge some money. So, as you can see for many of the countries, there is partial ban US, Canada, Mexico, most of North America, Brazil, Argentina, Chile and some other Latin American and South American countries. So, there is a partial ban.

So, that is the red color is the total ban. So, there are some in some countries here which has a total ban then some African countries have total ban which we talked about, we talked about Rwanda and also Kenya, Ethiopia, so Mozambique, South Africa, so many of those countries also have total ban. India and China also has full country ban on certain types of plastics. Bangladesh had partial ban on certain types of plastic now, Australia also have partial ban and New Zealand not implemented but they are still thinking about it. Some states here not implemented, but they are thinking about that as well. Here in, Europe some countries are thinking about having a ban.

But in if you look at the western European, it is kind of really interesting here. So, if you look at the western European, if you remember from their class that we have been talking about in this or some of you may have taken a waste management course either on NPTEL or some other forum where in whenever we look at waste management or environmental, if we look at Europe as an example. But as you say and see over here, Europe seems to be not that much into the banning, they are more into trying to tax charges or other measures.

So, they are there instead of fines or bans, they are actually looking at alternatives. They are looking at how to really their charging money and generate revenue and they are trying to have a proper plastic waste management system rather than I have visited some of those plants in Netherlands and in Austria. And they are wonderful, they try to capture most of it, there will be always make joke about Sweden as well that Sweden is recycling so much of garbage that it has to import garbage from other countries to run it waste to energy plant. So, because, so that is in Sweden they do lot very dedicated, very elaborate source segregation. So, as you can see these western European countries and most of the European countries here, many of them are not really thinking about banning they are thinking about charging.

They are taxing it, they are charging it and they are using that money to develop a robust working plastic waste management system. So, there is this two chain of thoughts we can talk about that; some countries are we are thinking about ban, but the other countries are also looking at how to reduce it early as we saw in the very first slide of the last video, one option of going towards this aspect is that you charge other; aspect is banned. So, Western European countries are mostly looking at the charging site and try to develop their own. And they do a very decent job of managing their plastic waste; probably one of the best in the world as compared to many other countries which are thinking about banning it.

So, we need to that is that is again a put for thought, we need to really think about what is what will work, we have to look at all these models before we kind of jump to a many times, what happens in Indian context or many many countries, I will say that we go by emotion we go we make it made a very rushed decision, that we have to ban it, we have to do this. But what is there is no follow up action, there is a there is no practical approach, practical approach is missing and we also do not we do not work on developing the infrastructure to really make that whatever policy decision we are making to work.

So, those things are needed. So, that is why, we have to look at what will really work and look at the examples from around the world. Good, good practices of around the world in terms of plastic waste management and see dos and do not's and what really works and what really does not work. And what works in one country may not work in the other country too. So, we have to be careful with that as well.

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ENVIRONMENT

Kenya Is Banning All Plastic Bags, And Planet Earth Is Extremely Grateful

#IsupportbanplasticsKE

(Source: www.globalcitizen.org)

Kenya

- As of August 2017, anyone in Kenya who's found using, producing, or selling a plastic bag faces up to four years in jail, or a \$38,000 fine.
- It's the world's harshest plastic bag ban, and it's prompting some seriously creative solutions.

swayam

INDIA WISE

So, Kenya was the banning all plastic bags that was long ago like a few years back. So, a few years is actually quite a. So, Kenya's banning all plastic bags and planet earth is extremely grateful. So, that is a nice catchy headline. So, Kenya has a fabulous 2017 who's for anyone found in Kenya with the plastic bag selling a plastic bag may go up to four years in jail and sorry, they may go for four years in jail or 30000, 38000 dollar fine that is a lot of money it is.

So, that is if I multiplied by 70, so that saying we are looking at close to 20 lakhs something around that maybe more, actually more 30 lakhs. So, close to 30 lakhs of fine, if 25 to 30 lacks are fine if you found with a plastic bag. So, if you are visiting to Kenya make sure you do not have your plastic bag. It is the world's harshest plastic bag ban and it is but that helped in creating some very creative solutions in Kenya where people are coming up with a very innovative solution in terms of managing the plastic bag, manage managing to make with this plastic bag.

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This South Pacific Nation Is the First of Its Kind to Ban Plastic Bags and Bottles

The PM of Vanuatu announced it the ban on Independence Day.

Vanuatu

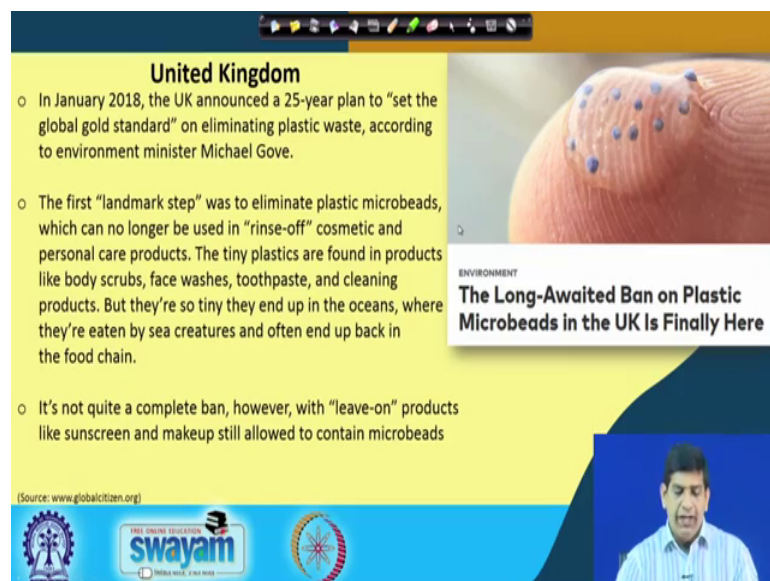
- On July 30, 2017, its independence day, the Pacific nation of Vanuatu announced the beginning of a phasing out of plastic bags and bottles.
- When implemented, it will ban the use or importation of single-use plastic bags and bottles — and it will make Vanuatu the first Pacific country to launch such a ban.

(Source: www.globalcitizen.org)

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Then one or two which is a South Pacific nation is the first of it is kind to ban plastic bags and bottle. The prime minister announced it ban on Independence day. So, they have on July thirtieth 2017 when it is Independence day, the pacific nations of when or to announce the pending of phasing out of plastic bags and bottle. When implemented it will ban, the use of single use plastic bags and bottles, it will make first pacific country to launch such a ban. So, there are there are some leadership coming from different parts of the world.

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United Kingdom

- In January 2018, the UK announced a 25-year plan to “set the global gold standard” on eliminating plastic waste, according to environment minister Michael Gove.
- The first “landmark step” was to eliminate plastic microbeads, which can no longer be used in “rinse-off” cosmetic and personal care products. The tiny plastics are found in products like body scrubs, face washes, toothpaste, and cleaning products. But they’re so tiny they end up in the oceans, where they’re eaten by sea creatures and often end up back in the food chain.
- It’s not quite a complete ban, however, with “leave-on” products like sunscreen and makeup still allowed to contain microbeads

(Source: www.globalcitizen.org)

ENVIRONMENT

The Long-Awaited Ban on Plastic Microbeads in the UK Is Finally Here

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UK, now it is announced a 25 year plan to set the global gold standard on eliminating plastic waste. Now, that is according to the environment minister. So, they are looking at coming up with global gold standard which in terms of eliminating plastic waste according to the minister Michael Gove. The first step was to eliminate plastic Microbeads. So, again this is very very important actually. We have been talking about banning of single use plastic bags and single use plastic in general. But one of the sources of plastic is which is really harmful for the environment is this microbeads which is used in the scrubber that we scrub the face while you try to have take your dead skin out.

And it is used in many many applications even they used the glittery glue and all those plays things, it uses lots of plastic microbeads. And when it is used it is, it rinsed off cosmetic and personal care product. So, which can no longer be used in the rinse off and the tiny plastics are found in products like body scrubs, face washes, toothpaste as well. Sometimes, those toothpaste which has like lot of it is not very smooth, it is has it is a little bit of rough and gives you a sandy sand grain kind of feeling, that also has plastic beads. Think about were taking the plastic beads in our in our mouth and, so if part of it of course, while doing it will come out, but there could be a little bit of it which goes into the body too.

And over time, you do plus do you do your brush at least two times a day that was dentist recommend. So, you should brush morning and evening and. So, that is and then your if you are you even getting a little bit of that microbeads coming into your body every two times a day, 7 days a week and think about to your lifetime up to 50 years of your age, then that will add up and that may create problem for different kind of health issues. So, cleaning products also uses that. So, they are so tiny they end up in ocean, they at end up in ocean where they are eaten up by the sea creatures and often end back into the food chain. So, that is the UK as looking at banning this microbeads.

So, we have to say for in the Indian context too, we this is one area which should be looked into and I hope that government is already looking into this area where single use plastics thing is great, but what about microbeads? What about these beads in our all these different products that are being sold in the market? In Indian, in the Indian conditions most of it our or even the sewage treatment plant is not working properly many many places. So, our sewerage system is just going into the surface water. So, all

these micro plastics when we take, when we put all those scraps and there is all these cosmetics lay we take shower. So, these all these micro plastics are getting into the water and then finally, to the surface water and to the ocean.

So, it is not quite a complete ban, but with a leave on products like sunscreen and makeup will be allowed to contain microbeads. So, there are some like sunscreen and makeup still allowed to contain microbeads which in my view, they should try to gradually phase out that as we well because it is a nasty stuff. We do not want this micro plastics showing up in our ocean because it affects the seafood and then it gets back to the food chain and it also affects the all the species present in ocean.

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Taiwan

- In February, Taiwan announced one of the farthest-reaching bans on plastic in the world, restricting the use of single-use plastic bags, straws, utensils, and cups.
- The ban — which builds on existing regulations like a recycling program, and extra charges for plastic bags — should be completely in force by 2030.

ENVIRONMENT

Taiwan Announces Ban on All Plastic Bags, Straws, and Utensils

(Source: www.globalcitizen.org)

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Taiwan, it is in February of they announced February of last year, in February of 2018, Taiwan announced one of the farthest reaching bans on plastic in the world. So, they are restricting the use of single use plastic their use of single, I am sorry they use of single use plastic, straws, utensils and cups. So, all those the ban which builds on existing regulation like a recycling program. The extra charge for plastic bags would be completely enforced by 2030. So, they are trying to put this in place. They will put some extra charges for plastic bags and then generate money to implement this policy. So, Taiwan bans all plastic bags, straws and utensils. So, that is in February of last year when they come up with this ban.

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ENVIRONMENT

Zimbabwe Bans Styrofoam-Like Food Containers

Environmentalists hope that this ban will spur a chain reaction of similar bans.

Zimbabwe

- In July 2017, Zimbabwe announced a total ban on expanded polystyrene (EPS), a styrofoam-like material used for food containers that takes up to a million years to decompose.
- Those caught violating the ban have to pay a fine of between \$30 and \$500.

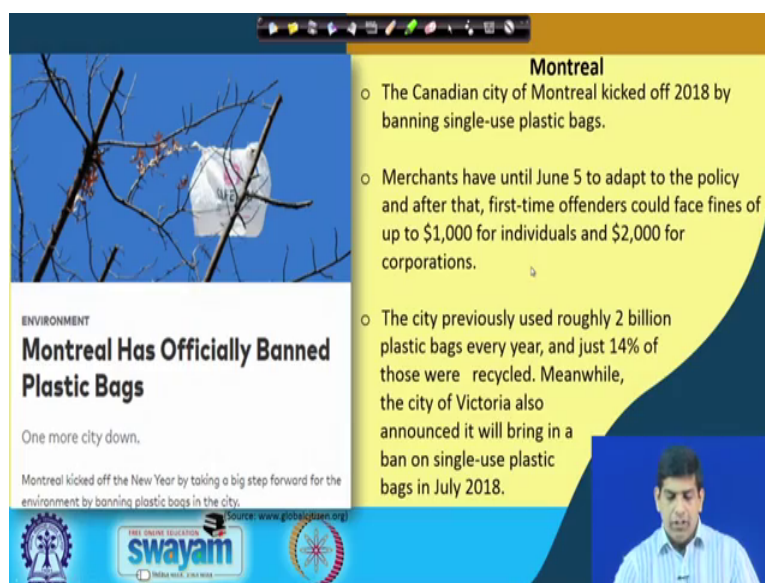
Source: www.gobalgreen.org

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Zimbabwe, they are in July 2017 announced a total ban on EPS which is expanded as polystyrene a styrofoam like material use for food containers. Those material that you get when you go to any restaurant, after you eat something, there as the leftover food the restaurant ask you whether you want to carry at home and that the container in which you carry at home is actually expended polyester in container. So, it takes a million years to decompose.

So, you may not have thought about it. So, when it is it may take up 2 million years to decompose. So, those, so you see those pictures of those right here. So, this is a they caught while violating anybody, find violating a ban depending on the type of violation, it is a fine of dollar 30 to dollar 500. So, that is that is the ban they are thinking about.

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Montreal

- The Canadian city of Montreal kicked off 2018 by banning single-use plastic bags.
- Merchants have until June 5 to adapt to the policy and after that, first-time offenders could face fines of up to \$1,000 for individuals and \$2,000 for corporations.
- The city previously used roughly 2 billion plastic bags every year, and just 14% of those were recycled. Meanwhile, the city of Victoria also announced it will bring in a ban on single-use plastic bags in July 2018.

ENVIRONMENT
Montreal Has Officially Banned Plastic Bags
One more city down.
Montreal kicked off the New Year by taking a big step forward for the environment by banning plastic bags in the city.
Source: www.globetalks.org

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FREE ONLINE EDUCATION
MEDIA NOTE: 2018 WIDE

Then Canada, Montreal which is with Canadian city of Montreal which is in Quebec kicked off 2018 by banning single use plastic bags. So, they do not want single use plastic bags. Even some of the other his cities, they have not using plastic bags. So, they are actually encouraging people, many many of these grocery stores what they are doing is they are providing alternative bags which is a reusable bags for a certain price and then you can you keep on bringing that bag rather than using this single use plastic bag.

So, they banned single use plastic bag. So, merchants have until June 5 to adapt to the policy, after that first offender face fine of 1000 dollars and 2000 dollars for corporation. So, city used to have roughly 2 billion plastic bags every year. And just 14 percent of those were recycled. So, that is a lot of plastic bags. Meanwhile, the city of Victoria also announced it will bring a ban on single use plastic in July. So, it is in July 2018 city of Victoria also started having plastic bag banned. So, there are lot of things are happening globally in different countries.

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Malibu

In March 2018, the Californian city of Malibu's local council voted to ban the sale, distribution, and use of single-use plastic straws, stirrers, and plastic cutlery, to begin on June 1.

The idea is to keep plastic from reaching the city's beaches and the ocean.

ENVIRONMENT

Malibu Bans Single-Use Straws, Cutlery, and Stirrers

[Source: www.globalcitizen.org]

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Malibu in March this Californian city of Malibu locals well council voted to ban the sale distribution use of single use plastic straw to begin in June 1. Idea is to keep the plastic from reaching city beaches and a ocean that is.

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MEDIO AMBIENTE

Seattle to Ban All Plastic Straws, Utensils in Restaurants in 2018

It's part of a much larger movement.

Seattle

- As of July 1, Seattle will become the first US city to enact a ban on plastic straws, along with single-use plastic utensils.
- The ban was tested in September 2017 with a city-wide "Strawless in Seattle" campaign, which involved more than 100 restaurants, major sports organization's, airports, and aquariums, among others.

[Source: www.globalcitizen.org]

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So, that was in Malibu Seattle ban, all plastic straw a utensils in restaurant in 2018 that started in July 1 of last year, the first us city to enact a ban on plastic straws along with single use plastic utensils.

Ban was tested in September with the citywide strawless, straw less in Seattle campaign which involve major 100 restaurants major sporting organization airports aquariums and others. So, they did test it out to see whether it will work.

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Australia

- South Australia, the Australian Capital Territory, Tasmania, and the Northern Territory, have state-wide bans on single-use plastic bags, and Queensland is set to follow in July 2018.
- Meanwhile, major Australian supermarkets Coles and Woolworths have announced they will phase out single-use plastic bags by mid-2018 — to impact customers in Victoria, New South Wales, and Western Australia.
- Australia is one of the largest waste producers in the world, second only to the US, with Australians using an estimated 5 billion plastic bags every year before the ban, according to Clean Up Australia.

(Source: www.globalcitizen.org)

Major Australian Supermarkets Ban Single-Use Plastic Bags

"It's time for us to #banthebag at every level."

Woolworths

swayam

Australia, South Australia that Tasmania, Australian capital territory, Tasmania and the northern territory have a statewide ban on single use plastic. And Queensland has started that also in July 2018 Coles and Woolworths they announced that it will these are the major supermarkets like our Spencer's or Reliance fresh even naturally they are bigger than that but similar style. They will face out single use plastic bag by mid 2018 and they did start doing that.

I was there during mid 2018 in Melbourne, Australia for 4 months. So, there I did see during actually during at the time, I was present there in I think it started on first of July, I was there for 15th of May to 15th of September. So, in first of July, they started where we have to people have to bring their own bags or they can buy a bag or they will started charging money for the bag.

But later on, they had some issues where the people were requesting bag and this is they made it optional which is not really they had to kind of relent bag because there was a lot of demand for using those plastic carry bags or this basically they started not charging for those reusable bags. So, that is that is also they did. So, Australia is one of the largest waste produces. Second only to us with Australian having as 5 5 billion plastic bags

every year before the ban according to clean up Australia. So, according to this NGO basically they and there are 5 billion plastic bags. And Australia has a huge sea shore. Australia is an island basically. So, it is usually get all may things may go into the ocean from all the different sites of that particular country. So, again ban the bag, some initiative going on in Australia.

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Canada

- In January 2018, Canada put a full stop to plastic microbeads. Although microbeads are still permitted to be manufactured and imported for non-prescription drugs and certain natural health products until July 1.
- Research had previously found that there were 1.1 million microbeads per square kilometer in Lake Ontario.

(Source: www.globalcitizen.org)

ENVIRONMENT
Canada Has Officially Banned Toiletries That Contain Plastic Microbeads

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Canada, they put a full stop on plastic microbeads. You saw the example of Montreal going for bags as well. I still permitted for non-prescription drugs and certain natural health product until July which is last year. So, they officially banned toiletries that contain plastic microbeads, that is really good research has previously found that 1.1 million microbeads per square kilometer in Lake Ontario.

So, those 5 lakes the North America the northern part of US and the southern part of Canada, they depend a lot on those 5 lakes in terms of their water for their like if food and take a fish and all that. So, it is they are if they always look at trying to keep it as clean as possible. And so, that is and one of this biggest Lake Ontario, 1.1 million microbeads per square kilometer. So, as this these are these are really nasty stuff which gets into the food chain through this phase. So, Canada is officially banned toiletries. So, this is really good.

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Hamburg

- The German city of Hamburg brought in a fairly niche plastic ban in February 2016 — against non-recyclable plastic coffee pods.
- Many of the pods can't be fully recycled, and those that can be recycled consume a lot of energy because of their complicated design.
- Before the ban, billions of the plastic shells were piling up in landfills each year.

German city bans plastic coffee pods in another win for the environment

There's no need for non-recyclable coffee pods.

[Source: www.globalcitizen.org]

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INDIA WISE, LEAD WISE

Video inset showing a man speaking.

Then Hamburg Germany, which is a fairly niche plastic ban in February 2016 against non-recyclable plastic coffee pots. These are the coffee pots you see on the right in here. This coffee pots which you can use in the coffee machine some of you may have seen that it is Lincoln comes with different flavors and other stuff as well. So, this use a rather than using like they like we use the tea bags for tea, you can use this as a coffee pots in the coffee machine and you this will form a coffee dispenser machine and there are certain machines where you can use and you did you can make your coffee.

But these are non-recyclable, they also contains different types of plastics. So, there is the German city they has that there is no need for non-recyclable coffee pot. So, millions of plastic cells were piling up in the landfill every each year. So, lot because coffee a lot of people use consume coffee maybe multiple times a day as well. So, that is, so they do add up into the environment.

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France Is the First Country to Ban Plastic Cups, Plates, and Cutlery

Au revoir plastic!

France

- In 2016, France became the first country to announce a total ban on plastic cups, plates, and cutlery, to be brought in from 2020.
- It followed the country's total ban on plastic bags in 2015, in an effort to transform France into "an exemplary nation in terms of reducing its greenhouse gas emissions, diversifying its energy model, and increasing then deployment of renewable energy sources."

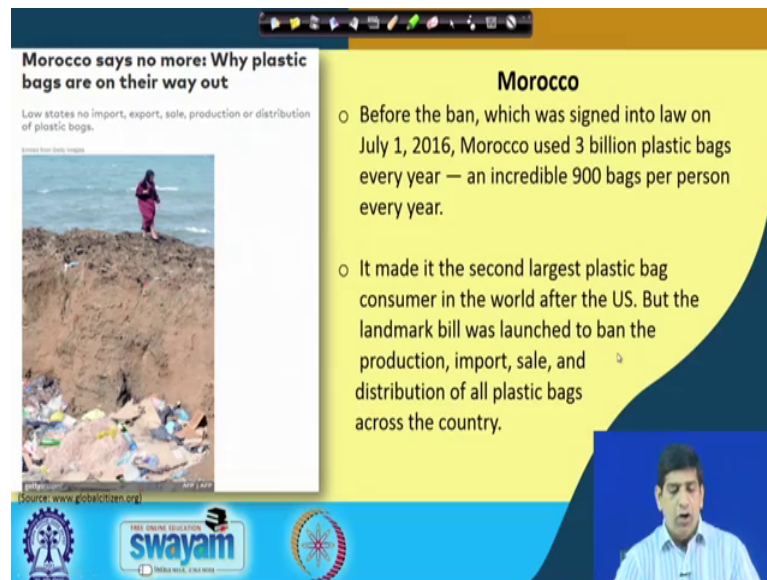
Source: www.globalcitizen.org

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France in 2016 again the ban the plastic cups plates in cutlery. France became the first country to end on the ban to be brought from 2020. So, it is to be brought it is still in process. So, they ban in 2016, they announced it in 2016 giving the industry an option of coming up with alternatives and solutions, alternative arrangements until 2020.

So, there is some time given for to come up with a newer product, alternative product which can really take the place of these single use plastic cups plates and cutleries. It followed the country's, total ban of plastic bags in 2015 transform France into an exemplary nation reducing greenhouse gas emissions and all that.

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Morocco says no more: Why plastic bags are on their way out

Law states no import, export, sale, production or distribution of plastic bags.

Source: www.globalcitizen.org

Morocco

- Before the ban, which was signed into law on July 1, 2016, Morocco used 3 billion plastic bags every year — an incredible 900 bags per person every year.
- It made it the second largest plastic bag consumer in the world after the US. But the landmark bill was launched to ban the production, import, sale, and distribution of all plastic bags across the country.

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Then Morocco says no more why plastic bags are on their way out. So, before the ban which was signed into law on July 1, Morocco used 3 billion plastic bags each year incredible 900 bags per person per year. So, a lot of bags coming then, it made it to a second largest plastic bag consumer, but the landmark bill was launched to ban the production import sale and distribution of all plastic bags across the country. So, that is in morocco is also looking at the banned.

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Rwanda

- When other countries around the world were just starting to think about imposing taxes on plastic bags, Rwanda banned them completely.
- Since 2008, carrying a plastic bag in the country can earn you a jail sentence — although typically offenders receive fines of about \$61, according to Plastic Oceans campaign group.
- According to Plastic Oceans, the plastic bag ban is just the start for Rwanda, which is now hinting at becoming the world's first plastic-free nation and planning to become completely sustainable by 2020.

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How eliminating plastic bags in Rwanda saves lives and the economy

Rwanda is winning at sustainability in a way you wouldn't expect.

Rwanda which you looked at in that video as well, in the previous module towards, the end of the previous module and we have think about they were imposing taxes on plastic bags in 2008 carrying a plastic bag in the country can you a jail sentence, receive fines about 61 plastic ocean plastic ban is just a start which is now hinting at becoming the world's first plastic free nation plan to become completely sustainable by 2020.

So, Rwanda in general is helped working on sustainable aspects in different the day to day activities, agricultural, industry and all that and plastic ban is one of the one of the items that they are working on in a big picture in terms of environmental stewardship. So, that is, so you saw the about the Rwanda in the video too.

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New York

- While still just a proposal, the state of New York is considering banning plastic bags. The bill, introduced by Gov. Andrew Cuomo, calls for the end of single-use plastic bags in grocery stores and other retailers by next year, but includes exceptions for items like produce bags, take-out bags, and bags sold for garbage or food storage.
- "The blight of plastic bags takes a devastating toll on our streets, our water, and our natural resources, and we need to take action to protect our environment," Cuomo said in a statement.

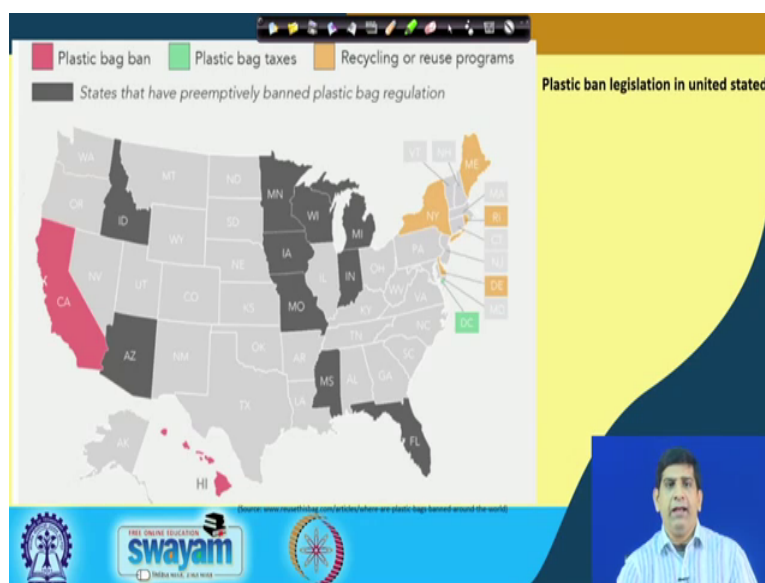
[Source: www.globalcitizen.org]

swayam
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So, this is in terms of Rwanda. New York, it is there was a proposal New York is considering banning plastic bags. Governor Andrew Cuomo calls for an end of single use plastic in grocery stores and retailers. There are certain exemptions into the produce bags, take out bags, bag sold for garbage at food storage.

So, the again a lot of plastic bags comes to streets, water or natural resources and we need to take action that is what Cuomo said in the statement which is a governor of New York. Toronto also tried few years bag, Toronto tried plastic bag ban and after some time they had to actually get back they, they release the ban. So, sometimes the again if you do not have a cheaper sustainable alternative which can do the same function, just coming up with a ban is does not really work.

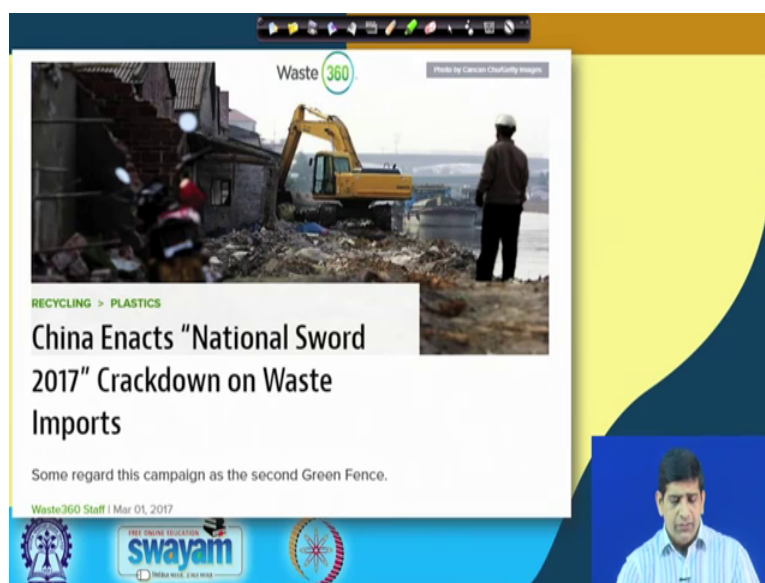
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So, in US, as US is a combination of several states and each state has their own kind of system it is a federal government has certain powers, but the state has a lot of their own states are more free in US system as opposed to an Indian system. So, here the states can take a lot of decisions which of course, they have to follow the federal guideline, but it could be more restrictive than federal rules. So, plastic bag ban is there in California. Plastic bag taxes is there in Washington DC. Recycle and reuse program is there in some of these new England states which is considered a little bit of progressive states as well, New York Rhode island and Delaware and other states and in some states are preemptively banned plastic bag regulations.

So, where they are trying to ban plastic bag Arizona, Mississippi, Florida, Indiana, Michigan, Wisconsin, Minnesota, Idaho and Hawaii, sorry Hawaii and Missouri. So, there are, so these are the states which have some, but most of the other states you see that there is no regulation yet like Tennessee, Kentucky, Ohio, Pennsylvania, Virginia, North Carolina, South Carolina, those does not have Georgia Alabama, they do not have any regulation. So, this is in terms of plastic ban status.

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So, let us, so this is what the global scenario is in terms of the plastic ban you saw that different countries are trying it some countries are looking at the ban, some countries are looking at the taxes in terms of improving collection system, improving the treatment system, improving the plastic waste management infrastructure. But, there are bans in many countries and some with the mixed success somewhere it is working, somewhere as I said.

For example, in Toronto they have to take it bag in Australia as well they were certain the earlier they were charging money for those reusable grocery bags and then they started they have to give it for free in Coles and that happened in the mid of last year. And I do not know what is the like it right now the present status. I hope they have gone back were charging some money.

So, again my request to all of you will be this as I said in the beginning of this course, this is a brand new course which has no textbook. So, we are trying to collect information from different sources and we are trying based on the course outline that we have proposed, we are trying to go into each topic and try to present you information which is available. But at the same time I would request you to like if you have some new information, let us know we will include that in our to do in the online live session and other stuff.

So, use the discussion forum if you have any newer things that you need to add to our to this particular topic. So, thank you and have a good one. So far, we are kind of going towards the middle of the course now. This is the fourth week, second module is over. So, again I will see you in the next module.

Thank you.