

Hi, kids! Welcome to the future of electricity!

Wow! What is all this stuff?

Everything here is the result of WPT (also known as Wireless Power Transfer) technology. We're working on the future of electric power! And I'm going to show you around!

WPT enables us to power up any kind of device without using cables.

What do you use instead of cables?

The power that would be fed through the cable is instead transmitted by a signal through the air and captured by the devices that use it to function.

Neat!

You bet! It's just like with any radio transmitter; only instead of transmitting communication signals we're sending power right to the devices on your very pocket.

You can be having coffee with a friend and your phone would be charging via WPT technology. Other possible devices are lamps, home appliances, drones and pretty much anything you can think of. Forgot your charger? No problem when you have WPT. It's less chords and less hassle.

I didn't know someone could work on cool stuff all the time...

Well, we wouldn't be able to if not for the European Commission's support. The Commission funded COST WIPE enables us to work on all this stuff!

COST WIPE?

COST is a type of project that allows people from different countries to meet and investigate new technologies and ideas. From all across, great minds are thinking up of clever ways to better our lives!

Well, the people working on COST WIPE mainly investigate and propose ideas in the following Work Groups...

FAR FIELD and NEAR FIELD: you'll see a lot of applications in those areas, and I'll tell you some examples in a bit.

COST WIPE is one of these promising projects, in which we think up new WPT ideas and solutions. We meet twice a year to put our ideas together and collaborate towards creating new and innovative solutions to power up devices wirelessly.

What sort of ideas and solutions?

MATERIALS: in which we develop new and exciting materials to work with, such as flexible electronics like tablets.

APPLICATIONS: that may include space usage like powering sensors in satellites, transportation like powering a car from the highway itself and even home appliances like your personal devices, washing machines, lamps, etc...

Going back to FAR FIELD, long distance can have some pretty nifty uses like checking out everything you have in storage through RFID (Radio Frequency Identification)

As for NEAR FIELD, you already saw a bit of it, just place your phone on a table with a WPT system and you'll be charging without ever having to plug it in!

I can even use WPT in my vineyards to monitor their temperature, humidity and other important parameters so I can get the best grapes.

There is a whole world of opportunities out there. Soon we'll be able to power up everything through the air: from the fridge in your kitchen to the airplanes in the sky and even the satellites out in space!

Say goodbye to cables because power is going to be coming through the air: freer than ever.

So, in the future will WPT power be everywhere?

I'm glad you asked that, because that's where the last WPT Work Group comes in...

REGULATION AND SOCIETY: It is very important to fulfil a standard, and as a potentially popular and widespread technology, it's our responsibility to guarantee we don't interfere with other applications.

Oh, right

Now you know about COST WIPE and the WPT technology! We've got a bright future ahead of us, thanks to the work of all our workgroups and the backing of the European Commission. Who knows?

Maybe next year we will have revolutionized the way we think about WPT and have even more awesome ideas! Only time will tell. Meanwhile, time to get back to work!

I want to be a scientist!

Me too!