

# Modernising Energy Efficiency through Digitalisation - Webinar Series:

## Total Energy Model for Connected Devices

Date and time: 28<sup>th</sup> April 2021, 10:00 – 11:00 CEST

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Registration link:

[https://ieaorg.zoom.us/webinar/register/WN\\_UUp\\_qknBRt2nFvNmJhg91g](https://ieaorg.zoom.us/webinar/register/WN_UUp_qknBRt2nFvNmJhg91g)

### Background information

Globally, the number of connected devices and equipment has doubled over the past five years, and this trend is expected to continue. While increased connectivity offers many benefits and opportunities for consumers, businesses, and electricity systems, there are growing concerns over the energy and carbon footprint of connected devices. For example, recent media headlines have highlighted the carbon footprint of streaming video, as discussed in [IEA's factchecking commentary](#).

The [EDNA Annex](#) of the IEA - 4E Technology Collaboration Program is focused on the increase in energy use caused by connecting everyday devices to the internet, as well as the energy-saving benefits stemming from the 'digitalisation' of these devices. EDNA has developed a quantitative global model of the 'total energy use' of connected devices. It covers the energy consumed by connected devices, such as when streaming data, as well as the 'upstream' energy increases that connected devices stimulate in data networks and data centres across the globe.

This webinar will present the results of EDNA's 'Total Energy Model' including a tour of the interactive graphs that are accessible on the [EDNA website](#). These graphs allow users to manipulate various assumptions, and view the changes in global energy consumption, in real time.

The IEA gratefully acknowledges Natural Resources Canada (NRCan) for their support for this webinar as part of their contributions to IEA's work on modernising energy efficiency through digitalisation and to the [Clean Energy Transitions Programme](#). The IEA equally acknowledges the support of the Super-efficient Equipment and Appliance Deployment (SEAD) Initiative.

## Speakers

The webinar will be introduced by George Kamiya, Digital/Energy Analyst, International Energy Agency, and presented by EDNA's consultants Paul Ryan, Director, EnergyConsult Pty Ltd and Anson Wu, Consultant, Hansheng Ltd, who developed the Total Energy Model.

## Agenda

10h00 – 10h10	<b>Welcome to the webinar and introduction</b> Moderator: Emi Bertoli, Policy Analyst, Energy Efficiency Division, International Energy Agency Presentation: <ul style="list-style-type: none"><li>• George Kamiya, Digital/Energy Analyst, Strategic Initiatives Office, International Energy Agency</li></ul>
10h10 – 10h40	<b>Presentation and online interface demonstration:</b> <ul style="list-style-type: none"><li>• Paul Ryan, Director, EnergyConsult Pty Ltd</li><li>• Anson Wu, Director, Hansheng Ltd</li></ul>
10h40 – 11h00	<b>Q&amp;A</b> Moderator: Emi Bertoli, Policy Analyst, Energy Efficiency Division, International Energy Agency