



**IGF** Internet  
Governance  
Forum



**IoT Global Good Practice**

RIPE meeting, Ahoy Rotterdam, 24 May 2023

# Building Global Trust in the Internet of Things

THE IGF DYNAMIC COALITION ON IOT BRINGS TOGETHER STAKEHOLDERS FROM ALL OVER THE WORLD TO ENGAGE IN A DIALOGUE ON “GOOD PRACTICE” IN IOT, WITH THE INTENT TO FIND A REALISTIC AND ETHICAL WAY FORWARD

# Benefits ... and challenges

- ▶ New technologies bring us ways to respond to today's challenges that never existed before ... and come with new challenges
- ▶ Technologies are not good or bad in themselves – it is how we use them.

## Societal challenges

Healthcare;  
Independent living;  
Secure society;  
Sustainable society

## Economic challenges

Innovation; growth;  
profit

## Environmental challenges

Scarce resources;  
waste reduction;  
environmental  
monitoring



## Governance

Global standards, open standards,  
multistakeholder involvement, ethical IoT

## Privacy and data collection

Big data issues, cloud issues (location, jurisdiction, accountability), digital literacy

## Security

Access, Autonomous systems, cyber attacks on new end points



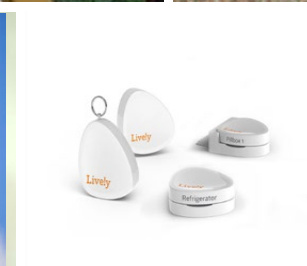
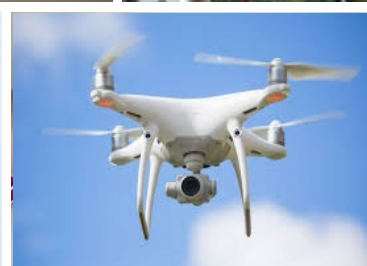
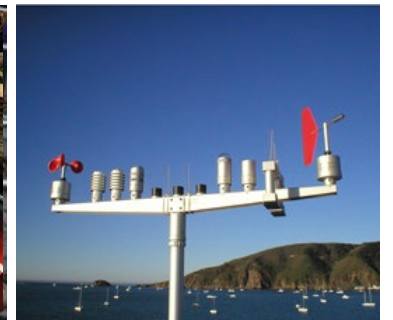
# Address specific societal issues

- ▶ Connected technologies are a necessity to addressing multiple societal challenges in a doable way.
- ▶ It requires sharing global knowledge about solutions, and local knowledge and action to make things happen.



# Many applications...

- ▶ Ranging from:
  - ▶ industrial IoT to Consumer IoT;
  - ▶ connected emergency warning systems to traffic management systems;
  - ▶ Health monitoring and enhancing systems to agriculture applications;
  - ▶ Wildlife tracking to security enhancing;
  - ▶ Autonomous systems to tools that enhance our human abilities;
  - ▶ and much more ....





# Global approach towards IoT

IGF AND THE  
DYNAMIC COALITION  
ON IOT

# IoT is part of Internet

1. IoT is merely a specific aspects of the Internet, just like social media, communication and access to information, and links to AI, Big Data
2. IoT has specific characteristics that will co-determine the development of future networks. This includes;
  - ▶ Collecting, storing and providing access to many data related on observations by sensors;
  - ▶ Autonomous networks with actuators that take action following receipt of specific data according to pre-programmed decision models, learning, or external interventions;
  - ▶ The possibility to “weaponize” IoT devices to attack third parties.

# Dynamic Coalition on IoT

- ▶ Set up in Hyderabad (IGF, 2008) and active ever since during IGF and regional meetings
- ▶ Aim is to develop a shared understanding
  - ▶ on Global Good Practice
  - ▶ with regards to the Internet of Things
- ▶ most IoT dialogues take place in silos with single stakeholders – in DC IoT ***multi- stakeholders meet on equal terms at global level***

# Internet of Things Good Practice Principle

- ▶ *Internet of Things Good Practice aims at developing IoT systems, products, and services **taking ethical considerations into account from the outset**, both in the development, deployment and use phases of the life cycle, **thus to find an ethical, sustainable way ahead** using IoT to help to **create a free, secure and enabling rights-based** environment: a future we want.*

(IGF Dynamic Coalition on IoT: “IoT Good Practice policies”)



# IGF DC IoT thinking in summary

## **Embrace IoT to address societal challenges in an ethical way**

- ▶ We need IoT to keep this world manageable

## **Create an IoT environment that encourages investments**

- ▶ Involve all stakeholders
- ▶ Create ecosystem
- ▶ Stimulate awareness and feedback
- ▶ Provide legal clarity and review the legal mechanisms

## **Ensure emergence of a trusted IoT environment**

- ▶ Meaningful transparency
- ▶ Clear accountability
- ▶ Real choice

# Key challenges today

1. **Ethical application of IoT**: what core values to embed in IoT devices, services and ecosystems, with regards to Data and algorithms
2. **Trusted IoT**: security and stability: how to ensure that IoT can be trusted not to be harmful to its users, nor the wider Internet;
3. **Sustainability**: whereas IoT contributes to monitoring and action towards a more sustainable environment, it needs to do so in a sustainable way;
4. **Deployment**: to be available and serving wherever it can contribute to an inclusive society, for the good of society;

WHAT'S NEXT?

# IoT towards the future



# Leveraging the work of DC IoT

- ▶ ***If we feel there is value in progressing an understanding of healthy development and deployment of IoT:***
  - ▶ At global level
  - ▶ Across application silos
  - ▶ With equal grounds for all stakeholder groups
- ▶ ***How can we progress this towards IGF 2023 and beyond?***

We create the world of tomorrow with  
the choices and actions of today ...



# More information

- ▶ Read on the IGF DC IoT pages:  
<https://www.intgovforum.org/en/content/dynamic-coalition-on-the-internet-of-things-dc-iot>
- ▶ Read more about the previous work of DC IoT:  
<https://medienstadt-leipzig.org/dciot/>
- ▶ Sign up for the DC IoT mailing list:  
[http://mail.intgovforum.org/mailman/listinfo/dc\\_lot\\_intgovforum.org](http://mail.intgovforum.org/mailman/listinfo/dc_lot_intgovforum.org)





# IoT Global Good Practice

# About Maarten Botterman

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- Independent analyst, strategic advisor, moderator and Board Director, see for more: [www.gnksconsult.com](http://www.gnksconsult.com)
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