

WEB OF
Marketing

TPAC Report and Discussion

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THINGS

Agenda

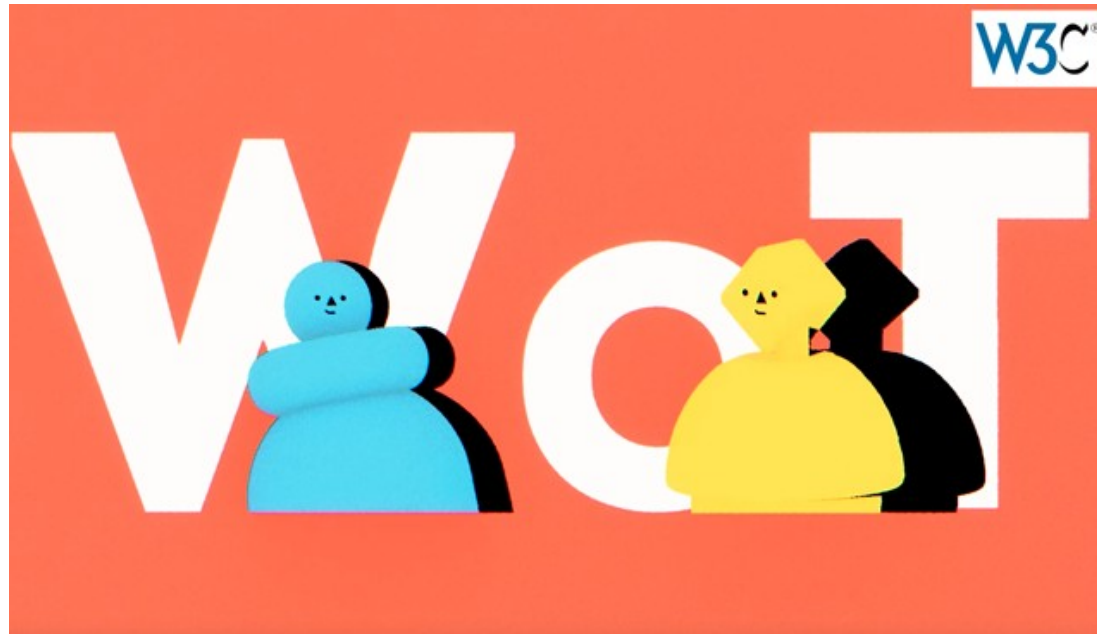
- Chair Changes
- Summary of the Work
- WoT Communication Platform

Chair Change

- Chair until September: Sebastian Käbisch
- Chair between September and now: Fady Salama
- Chair after TPAC: Ege Korkan
- Chair for Testing after TPAC: Fady Salama

Summary of the Work

- Explainer Video: <https://www.youtube.com/watch?v=WMFXg-kni0U>



Summary of the Work

- Continuous UI Improvements



Summary of the Work

- A new WoT Logo Animation by @relu91:
<https://github.com/w3c/wot-marketing/tree/main/material/logo-animation>

Summary of the Work

- Task Force Descriptions: <https://www.w3.org/WoT/activities/general/>

W3C WoT – Architecture Task Force

The WoT Architecture task force is responsible for the abstract architecture and interoperability profiles for the Web of Things.

Normative Deliverables

Current work is focused on two normative deliverables.

WoT Architecture

The WoT Architecture specification describes the abstract architecture for the W3C Web of Things. It defines the terminology that is used by all other WoT building blocks. The specification defines a conceptual framework that can be mapped onto a variety of concrete deployment scenarios.

WoT Profile

The WoT Profile Specification defines a Profiling Mechanism and a WoT Core Profile which enables out of the box interoperability among things and devices. Out of the box interoperability implies that devices can be integrated into various application scenarios without deep level adaptations. Typically only minor configuration operations are necessary (such as entering a network key or IP address) to use the device in a certain scenario. These actions can be done by anyone without specific training.

People

TF-Lead:

Michael Lagally (Oracle Corp.)

WoT Architecture Co-Editors:

Michael Lagally (Oracle Corp.), Ryuichi Matsukura (Fujitsu Ltd.), Toru Kawaguchi (Panasonic Corp.), and Kunihiko Toumura (Hitachi, Ltd.)

WoT Profile Co-Editors:

Michael Lagally (Oracle Corp.), Michael McCool (Intel Corp.), Ryuichi Matsukura (Fujitsu Ltd.), Sebastian Kaebisch (Siemens AG), and Tomoaki Mizushima (Internet Research Institute, Inc.)

Resources

- WoT Architecture TF Wiki (has meeting logistics)
- WoT Architecture github repository
- WoT Profile github repository

W3C WoT – Thing Description Task Force

The WoT Thing Description task force is responsible for defining the information model for WoT Thing metadata, its interpretation, and its common representation. In addition, the task force covers WoT Binding Templates topics to define the mapping from the abstract interaction model used in the Thing Description metadata to concrete IoT protocols and payload encodings.

Normative Deliverable

WoT Thing Description 1.1

This document describes a superset of the features defined for Thing Description 1.0. In general, this document describes the formal model of a Thing and its common representation in JSON-LD 1.1. It introduces a simple interaction model with Properties, Actions, and Events to describe the capabilities of a Thing, including its data model, communication protocols used, security mechanisms, and other semantic metadata. A WoT Thing Description defines a specific instance of a Thing. The WoT Thing Description 1.1 also formally introduces the Thing Model concept that describes sets of Things. It has fewer restrictions than the Thing Description and does not contain any instance-specific information.

Informative Deliverable

WoT Binding Templates

This document describes a set of vocabulary extensions to the WoT Thing Description that make up the Binding Templates. Binding Templates enable a Thing Description to be adapted to specific protocol or data payload usages across different standards. This is done through additional descriptive vocabulary that is used in the Thing Description.

People

TF-Lead:

Sebastian Kaebisch (Siemens AG)

WoT Thing Description Co-Editors:

Sebastian Kaebisch (Siemens AG), Takuki Kamiya (Fujitsu Laboratories of America), Victor Charpenay (Siemens AG)

WoT Binding Templates:

Michael Koster (SmartThings), Ege Korkan (Siemens AG)

Resources

- WoT Thing Description TF Wiki (has meeting logistics)
- WoT Thing Description github repository
- Web of Things (WoT) Thing Description 1.1
- WoT Binding Templates github repository
- WoT Binding Templates Note

Summary of the Work

- Documentation/Tutorial by @sebastiankb :

<https://www.w3.org/WoT/documentation/>

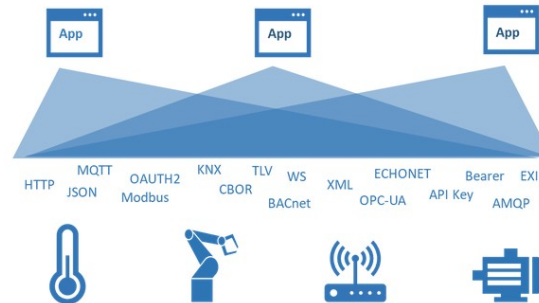
Documentation

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Web of Things in a Nutshell

Typically, in classical IoT projects, developers have to face a challenging situation. They have to understand a heterogeneous technology landscape consisting of diverse IoT systems and services from different vendors and manufacturers. This diversity includes variations in communication protocols, data models for payload data exchange, and security requirements. IoT applications are usually developed using high effort applied to a narrow and specific use case. During their lifetime, such applications are difficult to extend, maintain or reuse.



Summary of the Work

- Tutorial:
 - TUM/Siemens: Coming Soon
 - Philipp Blum: <https://bind.systems/tags/web-of-things/>



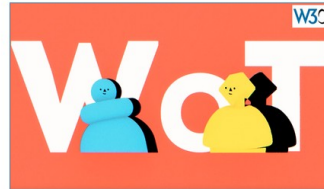
Summary of the Work

- Putting WoT Videos together: <https://www.w3.org/WoT/videos/>

WoT Videos

Please find below a list of videos in the context of Web of Things (WoT).

Introduction

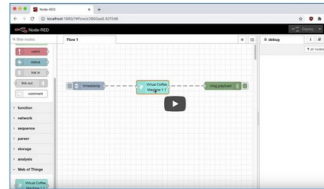


Web of Things (WoT) Explainer Video (alt)



TPAC 2020 Updates from the Web of Things Working and Interest Groups

Tutorials



Auto-population using Node-RED Node Generator - TPAC 2020 Demo by Web of Things Groups



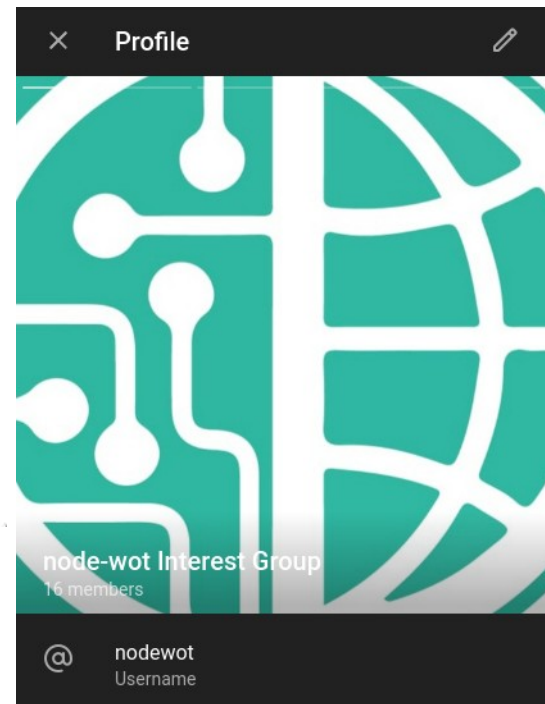
W3C WoT PlugFest outcome: Sprinkler and Display sync

Communication Platforms with Interested Parties

- <https://github.com/w3c/wot-marketing/issues/146>
- Goal: We want non W3C members to have easier discussions with the WoT WG and IG
- Why: Make WoT more approachable

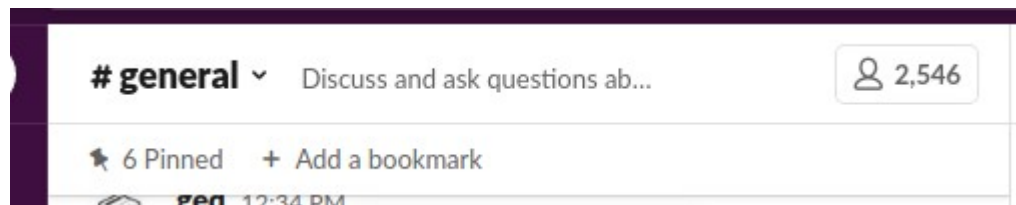
Communication Platforms with Interested Parties

- Example from node-wot:
 - Telegram



Communication Platforms with Interested Parties

- Example from JSON Schema
 - Slack ([Invite Link](#))
 - 2546 members
 - Daily ~ 5 questions



Possible Solutions

- GitHub Issues:
 - Off-putting to some due to “offensive” nature of the issue word
 - Repository specific
- GitHub Discussions:
 - + More approachable than GitHub Issues
 - Repository specific

Possible Solutions

- StackOverflow ([our tag](#))
 - + More approachable than GitHub Issues
 - We cannot moderate it
 - Recommendation-like questions and answers are **not** welcome, i.e. solution oriented

Possible Solutions

- Chat-based Platforms
 - WhatsApp, Telegram, Signal, etc.
 - Product
 - Single discussion thread, no channels
 - Requires mobile number
 - No need to join different *space* for each group
 - + Most people have one

Possible Solutions

- Chat-based Platforms
 - Slack
 - Product
 - Smaller community focus → More for teams
 - + We already have one
 - Limitation on the amount of saved messages

Possible Solutions

- Chat-based Platforms
 - Discord
 - Product
 - + Community Oriented
 - Used to be more associated to gaming

Possible Solutions

- Chat-based Platforms
 - Matrix
 - + Communication standard with your own clients (like IRC)
 - Less polished than Slack or Discord
 - Not well suited for video and audio calls

Communication Platforms with Interested Parties

- Other ideas?
- Discussion