

ASAM OpenODD in a nutshell

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(sorry I couldn't be here in person this year!)

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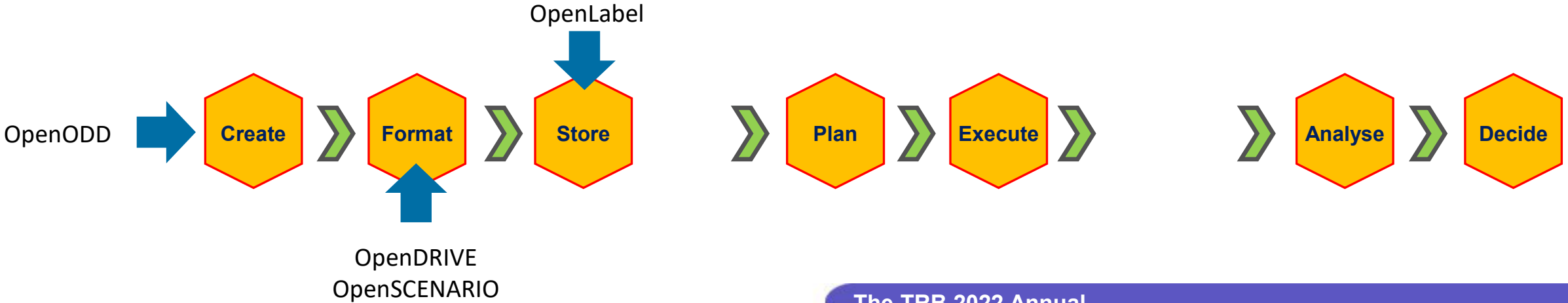
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Motivation for ASAM OpenODD

- In order to enable stakeholders to share, compare and re-use ODD definitions, there is a need for standards that
 - outline the attributes to be used for ODD definition (taxonomy)
 - provide a format for defining the ODD using those attributes
- **BSI PAS 1883** provides a taxonomy for ODD
- **ISO 34503** uses the taxonomy to provide a high-level definition format for ODD
- **ASAM OpenODD** aims to provide a machine readable and clearly exchangeable format for this high-level format
- This format is measurable and verifiable for the attributes it specifies

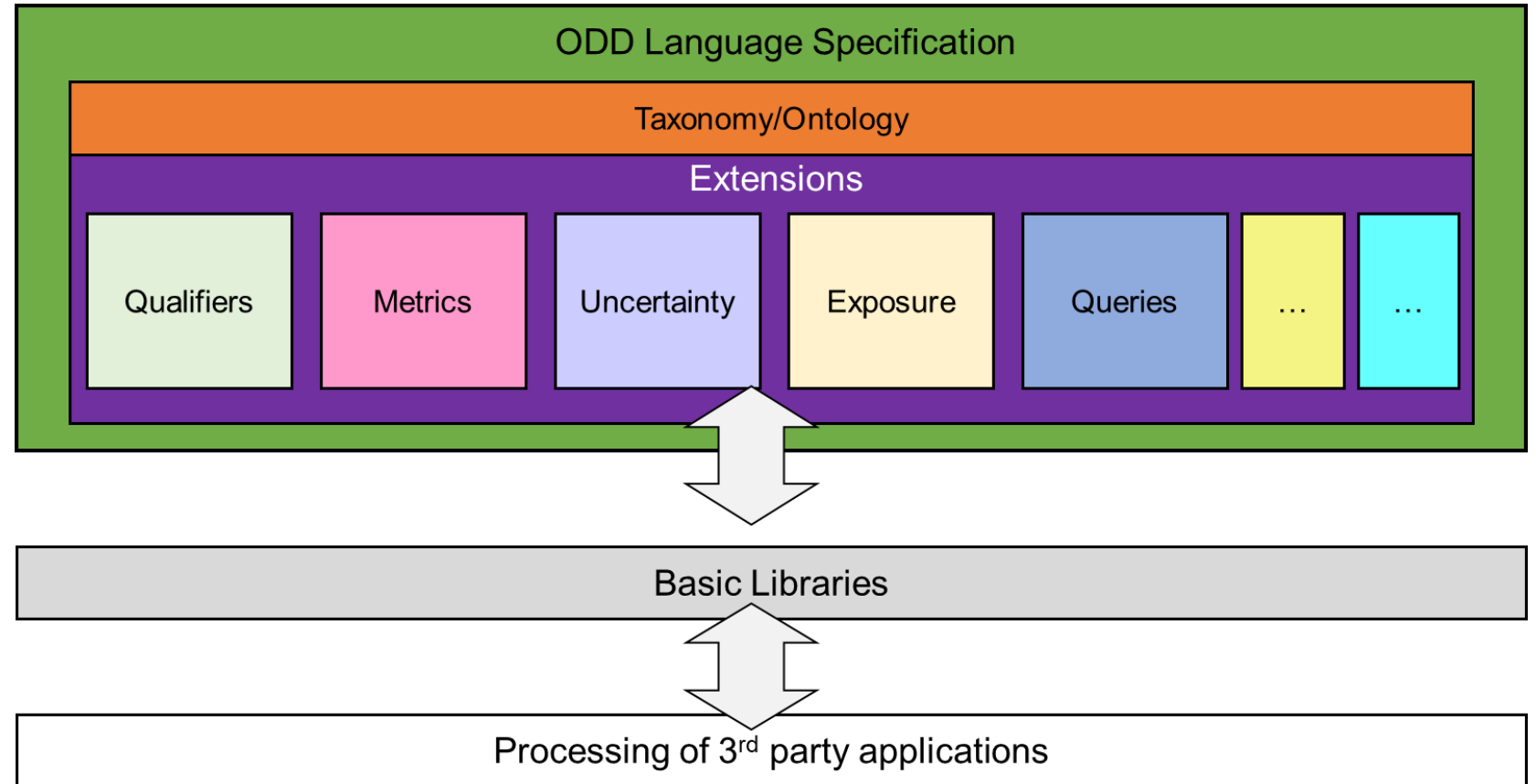
Scope

The aim is to provide a format that is capable of representing a defined Operational Design Domain for testing of connected automated vehicles (CAVs).



Scope

- The focus of the ASAM OpenODD project is on the language specification with the extensions
- A Taxonomy / Ontology will not be developed in the ASAM OpenODD project but may be referenced by it
- The extensions to be handled in version 1 of ASAM OpenODD will be finalized in during the early phases of the project
- See the preliminary work we did in the concept paper here:
<https://www.asam.net/standards/detail/openodd/>



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ODD Definition Example



Examples demonstrated in different syntaxes proposed by the concept paper

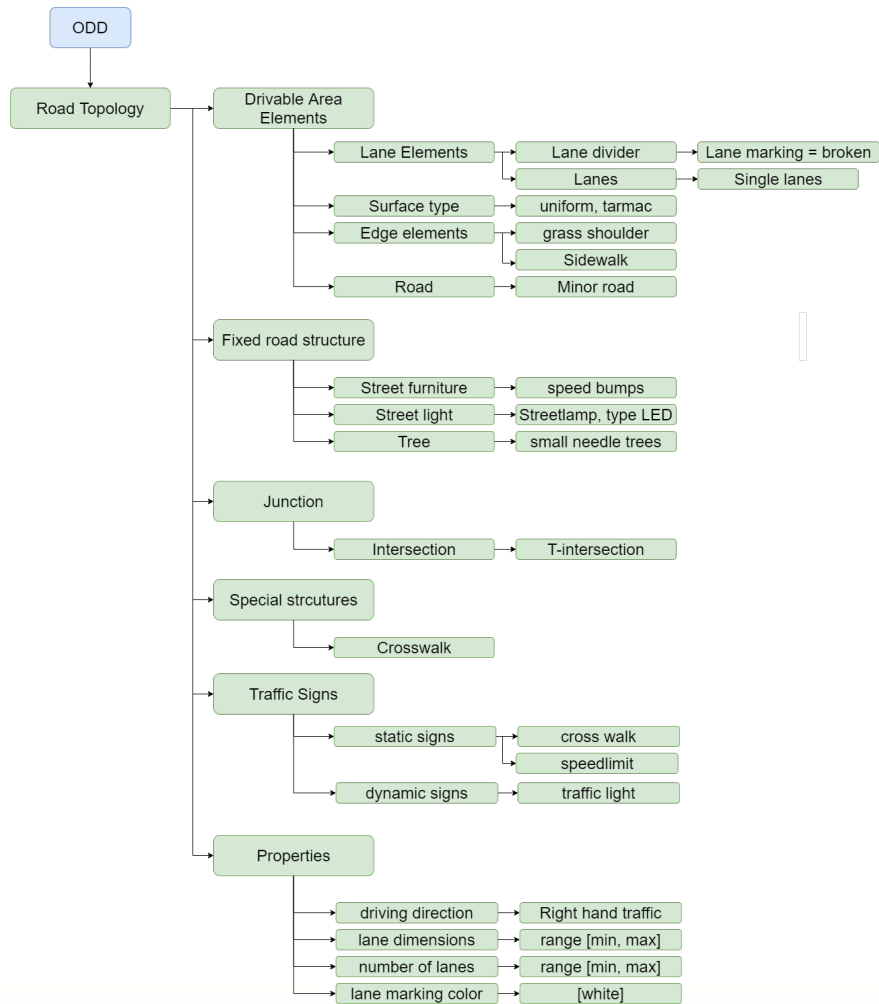
```

permissive_odd: ODD:
  keep(road_topology.lane_dimensions in [3..5]m)
  keep(road_topology.number_of_lanes in [1..2])
  keep(speed < 50 kph)
  
```

```

myODD(
  MODE: 'permissive';
  SUITABLE laneDimensions WHEN {min: 3.0, max: 5.0};
  SUITABLE numberOfLanes WHEN {min: 1.0, max: 2.0};
);
  
```

Note: The language syntax for OpenODD is still to be decided in the upcoming project.



The ASAM OpenODD project

- Project kickoff proposed for early August
- Project end and V1.0.0 release planned for Q1 2024
- Project enrollments are open!
- Interested but not sure if the standard is for you?
 - First phase (2 months) of the project is focused on knowledge sharing – what is OpenODD
 - Enrollment to the initial phase is open to all (including non-members)
 - Scope finalisation and the development of the standard is restricted to ASAM members only

See project proposal and enroll online here:

<https://www.asam.net/project-detail/asam-openodd-v100>

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Thank you!

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