TRAINING DAY-9

REPORT:

25 June 2024

Keys Takeways:

Use of JSON in WebVOWL

- **Primary Format**: JSON is the main format used by WebVOWL to visualize ontologies.
- **Benefits**:
    - Simplicity and readability. ◦ Broad interoperability across platforms.
    - Efficient parsing and performance.
- **Function**: Captures ontology structure and elements (classes, properties, relationships) in a VOWL-compliant JSON format for interactive visualizations.

Use of XML in WebVOWL

- **Ontology Creation**: Ontologies are often created in OWL (XML format) using tools like Protégé.
- **Conversion to JSON**: OWL (XML) files are converted to JSON for compatibility with WebVOWL.
- **Visualization Workflow**:
    1. Create/Edit ontology in XML.
    2. Convert XML (OWL) to JSON.
    3. Load JSON into WebVOWL for visualization.

Creating a Smart City Architecture on WebVOWL

- **Ontology Design**: Define key elements (e.g., buildings, transportation, utilities) and their relationships.
- **JSON Conversion**: Convert the designed ontology from OWL (XML) to JSON.
- **Visualization**: Load the JSON file into WebVOWL to visualize and interact with the smart city architecture.
- **Analysis**: Utilize WebVOWL's interactive features to analyze and refine the smart city ontology.

Hands-on Practice on WebVOWL

- **Setup**: Install and configure WebVOWL.
- **Loading Ontologies**: Practice loading various JSON files representing different ontologies.
- **Interactive Exploration**: Use WebVOWL's tools to navigate, explore, and manipulate ontology visualizations.
- **Customization**: Modify and extend visualizations by editing the JSON ontology files and observing changes.