

2023 OHDSI Vaccine Vocabulary WG Achievements:

- 1. We built up a consensus of using the **Vaccine Ontology (VO)** to map and incorporate different vaccine terminologies and provide additional features.
- 2. Developed an effective pipeline by combining **automatic term mapping** with manual review, verification, and annotations.
- 3. Finished the mapping and incorporation of all vaccine terms (254 **CVX** vaccine terms) in CVX to VO using our pipeline.
- 4. The work was presented in the OHDSI 2023 symposium.

Citation: Yuanyi Pan, Warren Manuel, Rashmie Abeysinghe, Xubing Hao, Alexander Davydov, Qi Yang, Asiyah Yu Lin, Licong Cui, Yongqun Oliver He. **Harmonization of OMOP vaccine-related vocabularies through the Vaccine Ontology**. *OHDSI 2023 Global Symposium*, East Brunswick, New Jersey, Oct. 20-22, 2023. Four pages brief report and poster presentation. Report URL: <u>https://www.ohdsi.org/wp-content/uploads/2023/10/27-pan-BriefReport.pdf</u>. Poster URL: <u>https://www.ohdsi.org/2023showcase-27/</u>



Objective 1 : Map vaccine terms in two OMOP vaccine standards (i.e., **RxNORM** and RxNORM extension) to the Vaccine Ontology (VO) and add new VO terms if no mapping is found.

Key results:

- 1. Map/add vaccine terms in RxNORM to VO. Timeline: 1Q2024.
- Map/add vaccine terms in **RxNORM extension** to VO. Timeline: 2-3Q2024.



Objective 2 : Prepare an **OMOP submission** for the inclusion of VO to OMOP vocabulary as a **non-standard vaccine vocabulary**.

Key results:

- 1. Preparation for the submission. Timeline: 2Q2024.
- Fill out forms and submit for VO inclusion to OMOP. Timeline: 2-3Q2024.



Objective 3 : Use case study and presentation.

Key results:

- Develop and evaluate the usages of the VO vaccine classification for OMOP EHR data analysis using IQVIA and N3C data sources. Timeline: 2-4Q2024
- 2. Submit abstract and present the results in **OHDSI 2024 symposium**. Timeline: 3-4Q2024
- 3. Prepare a journal article. Timeline: 3-4Q2024.