

U.S. Military Weapons Input–Output Database 2013–2022

Topic: Input-Output Accounts (3)

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Escalating geopolitical tensions and record levels of military expenditure underscore the need to quantify the economic and environmental consequences of weapons production. However, in conventional national accounts, military production activities are either unreported as a distinct category or aggregated within civilian industries, obscuring its distinct input-output structures and constraining detailed analyses. Here, we develop the U.S. Military Weapons Input–Output Database (USMWIOD) for 2013-2022, which explicitly distinguishes military weapon manufacturing within the U.S. national input-output framework. This database comprises 397 sectors, including six military and six civilian weapon manufacturing sectors. It is constructed by integrating multi-source data with a balanced optimization model, reflects the specific features of weapon manufacturing, such as its input-output structures, defense sector connections, and import patterns. The USMWIOD dataset provides a consistent empirical basis for quantifying the economic, geopolitical and environmental impacts of U.S. military weapons production, as well as enabling interdisciplinary analysis. Furthermore, the framework used to build this dataset is transferable and can be extended to other countries and global input–output databases if supporting data are available.