

# Health Care Data Sets at the UMHS

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# AGENDA

- UMHS data landscape overview
- Data Office for Clinical and Translational Research (DOCTR)
- Privacy, security and compliance
- Data available: UMHS Data Set Catalog

# UMHS Data Landscape

There are numerous data sets available for use at the Health System. What is contained in the data sets, and how one gets access, varies. UMHS has some data sets that reach into the early 2000's, so there are rich sources of longitudinal data to utilize.

Also, while we have been managing internal data for some time, we have recently begun to publicize external data sets that can be shared within certain constituencies (e.g. the Institute for Health Policy Innovation).



# Health Care Data Complexity

Patient care data is complex. There can be inconsistent uses and variable element definitions or interpretations. Patient care methodologies change constantly and how physicians capture data can be individualistic. Standards even change, as was seen recently with the International Classification of Diseases move from ICD-9 to ICD-10.

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**Data Office for Clinical and Translational Research**

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- Contact Us
- Self-Serve Data Tools
- Custom Data Request
- Data Consultation
- Data Sharing Agreements
- Frequently Asked Questions
- More Clinical Data Resources
- Grant Review & Analysis
- Innovation & Business Development
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- Michigan Institute for Clinical & Health Research
- Unit for Laboratory Animal Medicine (ULAM)
- Research Development Support
- Research News & Events

# Data Office for Clinical and Translational Research



Part of the UMMS Office of Research and the Medical School's [Strategic Research Initiative](#), the Data Office offers a menu of resources to assist U-M researchers with compliant, secure access to patient health data. From using self-serve tools such as [Data Direct](#) to tap into records from 3.8+ million patients, to tailored requests involving our expert consultants, to assistance navigating the [many data resources](#) here at the U-M, the Data Office can help you find the patient data you need for your research.

Self-Serve Data Tools	Support your new funding proposal, inform study design, and craft limited patient data searches. <i>Free.</i>
Custom Data Request	Complex data pull that self-serve tools cannot address. <i>Fee for service.</i>
Data Consultation	Consultation tailored to your needs and a deep dive into all patient health data resources available. <i>Free.</i>
Data Sharing Agreement	Assure privacy and security safeguards are in place when sharing patient health data with external collaborators.

We host [quarterly presentations](#) on accessing clinical data for research. Please consider inviting us to present for your department meetings. [Contact us.](#)

<https://medicine.umich.edu/medschool/research/office-research/data-office-clinical-and-translational-research>

# Compliance Resource Center

A Roadmap to Compliance at U-M



- Browse by Topic
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- Browse by Topic
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See also [Dearborn](#) & [Flint](#) campus responsibilities

## Health Care

Providing patient care, conducting medical research and administering a large scale health system give rise to many legislative and regulatory compliance obligations. Due to its complexity, the U-M Health System (UMHS) it has its own a dedicated [UMHS Compliance Office](#) that oversees a full compliance program. However, there is considerable cross-over between UMHS and the wider U-M campus: for instance, Medical and Nursing School personnel perform both clinical and campus roles, and non-UMHS faculty, staff and students may interact with U-M's clinical function through their research and study. This site is intended to help connect such people with the relevant requirements and experts.

**Health Care topics:**

- [Health Information Privacy & Security](#)
- [Billing & Grant Funding](#)
- [Fraud & Abuse](#)
- [Other Health Care Related Regulation](#)

[Ask a question](#)  
[Report a concern](#)

### Responsibilities for health care compliance

- **All faculty, staff, students, volunteers, scholars and trainees who work in any capacity in the UMHS (including as observers)** are considered part of the **UMHS workforce**, and are responsible for ensuring compliance with relevant laws, and abiding by the [UMHS Code of Conduct](#). This applies equally to U-M faculty, staff and students who normally work and study outside the UMHS, but who interact with the UMHS in the course of their research, work or study (even on a [temporary visiting basis](#), and even if only as [observers](#)).
- **All faculty, staff, students, volunteers, scholars and trainees have a duty to report** any known or suspected violation of the law or [UMHS Code of Conduct](#) by the UMHS workforce.
- The [Executive Vice-President for Medical Affairs](#) is the chief executive officer of the UMHS, and has ultimate responsibility for compliance by U-M with all laws and regulations related to the provision of health care. ([Regents Bylaw 2.06](#))
- The [UMHS Compliance Office](#) (viewable on U-M networks only; or see this [external page](#)) oversees compliance by UMHS with all laws and regulations related to its research, education and health care missions. The [UMHS Compliance Committee](#) has direct oversight responsibility for UMHS compliance activities and assists the UMHS in fulfilling its legal obligations.

<http://compliance.umich.edu/healthcare/>

## Search datasets

Popular tags

- tumor identification
- treatment
- staging

The UMHS Data Set Catalog is a listing of data sets available to various constituents within the University, along with associated metadata that describes what each data set contains, how it can be accessed, who its stakeholders are, and what its history has been.

### UMHS Data Set Catalog statistics

<b>73</b>	<b>11</b>	<b>1</b>	<b>3</b>
datasets	organizations	group	related items

<https://datasetcatalog.med.umich.edu/>



# Information Contained in the Data Set Catalog

For each data set listed, the following information is detailed:

- Summary, including data asset type, high-level data model, and PHI indicator
- Stakeholders, including Data Manager, Data Steward, publisher, and collaborators
- Access, including qualifications required for access, access mechanism, access technical protocols, and terms of use
- Composition, including subject area coverage, data element definitions, system of record, source(s), and other notes
- History, including initial create date, last modified date, update schedule, and retention schedule



# SAMPLE Data Set Listing

<a href="#"><u>Patient Summary List (HSDW)</u></a>	<p>The Patient Summary List (PSL) subject area contains data about patients' allergies, health maintenance information, medications, medical conditions or diagnoses, immunizations, vitals, and medical and surgical procedures. This information can be self-reported by patients or identified during a UMHS service or visit with a UMHS resource (medical professional).</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/patient_summary_list_psl__health_system_data_warehouse">https://datasetcatalog.med.umich.edu/dataset/patient_summary_list_psl__health_system_data_warehouse</a></p>
<a href="#"><u>Operating Room (HSDW)</u></a>	<p>The OR subject area contains operating room data about scheduling, case, procedure, supply usage cost and charges, time, surgeons, transplants, and Procedure-and Case-level details for all University of Michigan Health System (UMHS) facilities supporting operating room functions.</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/operating_room_or__health_system_data_warehouse">https://datasetcatalog.med.umich.edu/dataset/operating_room_or__health_system_data_warehouse</a></p>
<a href="#"><u>Nursing (RDW)</u></a>	<p>Nursing is one subject area of data captured within the Research Data Warehouse (RDW). The Nursing subject area contains discrete data (eg, vitals, ins/outs) from nursing flowsheets in Centricity. The RDW is a physical SQL-based warehouse combining data from multiple sources with the primary purpose of supporting clinician researchers with self-service capabilities.</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/nursing_subject_area__research_data_warehouse">https://datasetcatalog.med.umich.edu/dataset/nursing_subject_area__research_data_warehouse</a></p>

# SAMPLE Data Set Listing

<a href="#"><u>Laboratory (RDW)</u></a>	<p>Laboratory is one subject area of data captured within the Research Data Warehouse (RDW). The Laboratory subject area contains real time pathology orders and results. The RDW is a physical SQL-based warehouse combining data from multiple sources with the primary purpose of supporting clinician researchers with self-service capabilities.</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/laboratory_subject_area__research_data_warehouse">https://datasetcatalog.med.umich.edu/dataset/laboratory_subject_area__research_data_warehouse</a></p>
<a href="#"><u>Publications (UMMS)</u></a>	<p>The Publications dataset is a curated faculty enrichment tool that matches UM Medical School and several other UM school faculty with their publications. It includes data on subject matter, authors, and organizations associated with publications. This dataset is used internally for promotion and tenure reviews, in support of grant applications, and as a tool for understanding the research enterprise through publications. The Publications dataset is public however access must be requested through the medical school.</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/publications__umms_business_data_warehouse">https://datasetcatalog.med.umich.edu/dataset/publications__umms_business_data_warehouse</a></p>
<a href="#"><u>Health Care Cost Institute (HCCI)</u></a>	<p>HCCI currently holds the largest collection of longitudinal health care claims data devoted to public reporting and research. HCCI's multi-year, HIPAA-compliant dataset includes the health care claims of 50 million individual-insureds, group-insureds, and Medicare Advantage insureds per year. This represents more than \$1 trillion of health care spending, over 5,000 hospitals, and 1 million different medical service providers. These data, contributed by four large national insurers, consist of de-identified medical claims with the actual amounts paid. HCCI datasets are de-identified in full compliance with HIPAA regulations.</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/health_care_cost_institute_hcci">https://datasetcatalog.med.umich.edu/dataset/health_care_cost_institute_hcci</a></p>

# SAMPLE Data Set Listing

<a href="#"><u>American Hospital Association Annual Survey</u></a>	<p>The AHA annual survey is the most comprehensive and authoritative source on U.S. hospitals, and their associated characteristics. Although the dataset can be used independently for studies of hospitals, many health care researchers link these data to other administrative or medical datasets, such as Medicare, Medicaid, and state or national inpatient datasets. Such linkages permit the analysis of patterns of practice and healthcare outcomes by types of hospitals. Almost 900 variables are present that permit categorization of hospitals based on size, ownership (for-profit, not-for-profit, government, system, etc), teaching status, and the presence of many facilities and services.</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/american_hospital_association_annual_survey">https://datasetcatalog.med.umich.edu/dataset/american_hospital_association_annual_survey</a></p>
<a href="#"><u>Proposal Management – eResearch (UM)</u></a>	<p>The eResearch Proposal Management data set contains administrative and financial data on proposals and awards processed by by the Office of Research &amp; Sponsored Projects. All proposals and awards are keyword coded, enabling searches on the sponsored activities of the faculty. eResearch is the University of Michigan's site for electronic research administration. eResearch data can be obtained from user-defined ad hoc queries.</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/proposal_management__eresearch__um_data_warehouse">https://datasetcatalog.med.umich.edu/dataset/proposal_management__eresearch__um_data_warehouse</a></p>
<a href="#"><u>UM Hospital Tumor Registry – Cancer Registry</u></a>	<p>Curated data-set containing structured data on inpatients and outpatients diagnosed or treated for malignant tumors and some benign CNS tumors at the University of Michigan Hospital. Collected in Metriq (specialized application). Data includes: demographic information, tumor characterization, treatment information, and outcomes (yearly follow-up for life). All eligible cases first seen at UM Hospital after 1/1/1995 have complete records and incomplete data is available for some cases seen before 1995.</p> <p><a href="https://datasetcatalog.med.umich.edu/dataset/um_hospital_tumor_registry__cancer_registry">https://datasetcatalog.med.umich.edu/dataset/um_hospital_tumor_registry__cancer_registry</a></p>

Questions?