Report to SAC from Barbara Bushman, NLM Liaison

February 2021

## MeSH Update

See [NLM Technical Bulletin November-December 2020](https://www.nlm.nih.gov/pubs/techbull/nd20/nd20_medline_data_changes_2021.html)

2021 MeSH was adopted for cataloging on December 7, 2020 and PubMed was updated on December 15.

### Changes to MESH Headings

Fourteen MeSH headings were either changed or deleted and replaced with up-to-date terminology:

|  |  |
| --- | --- |
| **Replaced Term** | **Replaced-By Term** |
| Alaska Natives | [Alaskan Natives](https://meshb.nlm.nih.gov/record/ui?ui=D000072957) |
| Aldehyde Dehydrogenase 1 | [Aldehyde Dehydrogenase 1 Family](https://meshb.nlm.nih.gov/record/ui?ui=D000080924) |
| Bonding, Human-Pet | [Human-Animal Bond](https://meshb.nlm.nih.gov/record/ui?ui=D001841) |
| Clostridium difficile | [Clostridioides difficile](https://meshb.nlm.nih.gov/record/ui?ui=D016360) |
| Debaromyces | [Debaryomyces](https://meshb.nlm.nih.gov/record/ui?ui=D055165) |
| Infantile Apparent Life-Threatening Event | [Brief, Resolved, Unexplained Event](https://meshb.nlm.nih.gov/record/ui?ui=D057768) |
| Mentally Disabled Persons | [Persons with Mental Disabilities](https://meshb.nlm.nih.gov/record/ui?ui=D019989) |
| Pectobacterium chrysanthemi | [Dickeya chrysanthemi](https://meshb.nlm.nih.gov/record/ui?ui=D016974) |
| Pimenta | [Genus Pimenta](https://meshb.nlm.nih.gov/record/ui?ui=D027841) |
| Pyruvate Dehydrogenase (Acetyl-Transferring) Kinase | [Pyruvate Dehydrogenase Acetyl-Transferring Kinase](https://meshb.nlm.nih.gov/record/ui?ui=D000081382) |
| Respiratory Distress Syndrome, Adult | [Respiratory Distress Syndrome](https://meshb.nlm.nih.gov/record/ui?ui=D012128) |
| RNA Replicase | [RNA-Dependent RNA Polymerase](https://meshb.nlm.nih.gov/record/ui?ui=D012324) |
| Site-Specific DNA-Methyltransferase (Cytosine-N(4)-Specific) | [Site-Specific DNA-Methyltransferase (Cytosine-N4-Specific)](https://meshb.nlm.nih.gov/record/ui?ui=D057265) |
| Social Distance | [Psychological Distance](https://meshb.nlm.nih.gov/record/ui?ui=D012929) |

### New MeSH Headings and Concepts

277 new MeSH headings were added

#### New MeSH Headings Related to COVID-19 and SARS -CoV-2

|  |
| --- |
| **MeSH Heading** |
| [Coronavirus 3C Proteases](https://meshb.nlm.nih.gov/record/ui?ui=D000086782) |
| [Coronavirus Envelope Proteins](https://meshb.nlm.nih.gov/record/ui?ui=D000086968) |
| [Coronavirus M Proteins](https://meshb.nlm.nih.gov/record/ui?ui=D000086862) |
| [Coronavirus Nucleocapsid Proteins](https://meshb.nlm.nih.gov/record/ui?ui=D000086462) |
| [Coronavirus Papain-Like Proteases](https://meshb.nlm.nih.gov/record/ui?ui=D000086882) |
| [Coronavirus Protease Inhibitors](https://meshb.nlm.nih.gov/record/ui?ui=D000085683) |
| [Coronavirus RNA-Dependent RNA Polymerase](https://meshb.nlm.nih.gov/record/ui?ui=D000086422) |
| [COVID-19](https://meshb.nlm.nih.gov/record/ui?ui=D000086382) |
| [COVID-19 Nucleic Acid Testing](https://meshb.nlm.nih.gov/record/ui?ui=D000087123) |
| [COVID-19 Serological Testing](https://meshb.nlm.nih.gov/record/ui?ui=D000087124) |
| [COVID-19 Testing](https://meshb.nlm.nih.gov/record/ui?ui=D000086742) |
| [COVID-19 Vaccines](https://meshb.nlm.nih.gov/record/ui?ui=D000086663) |
| [Receptors, Coronavirus](https://meshb.nlm.nih.gov/record/ui?ui=D000085064) |
| [SARS-CoV-2](https://meshb.nlm.nih.gov/record/ui?ui=D000086402) |
| [Spike Glycoprotein, Coronavirus](https://meshb.nlm.nih.gov/record/ui?ui=D064370) |

#### Other New MeSH Headings of Interest to Searchers for COVID-19 and SARS-CoV-2

|  |
| --- |
| **MeSH Heading** |
| [3C Viral Proteases](https://meshb.nlm.nih.gov/record/ui?ui=D000086042) |
| [Angiotensin-Converting Enzyme 2](https://meshb.nlm.nih.gov/record/ui?ui=D000085962) |
| [Anosmia](https://meshb.nlm.nih.gov/record/ui?ui=D000086582) |
| [Chain of Infection](https://meshb.nlm.nih.gov/record/ui?ui=D000086003) |
| [Disease Hotspot](https://meshb.nlm.nih.gov/record/ui?ui=D000086822) |
| [Host Adaptation](https://meshb.nlm.nih.gov/record/ui?ui=D000086967) |
| [Latent Infection](https://meshb.nlm.nih.gov/record/ui?ui=D000085343) |
| [N95 Respirators](https://meshb.nlm.nih.gov/record/ui?ui=D000087162) |
| [Pangolins](https://meshb.nlm.nih.gov/record/ui?ui=D000086642) |
| [Physical Distancing](https://meshb.nlm.nih.gov/record/ui?ui=D000085762) |
| [Positive-Strand RNA Viruses](https://meshb.nlm.nih.gov/record/ui?ui=D000085102) |
| [Prolyl Oligopeptidases](https://meshb.nlm.nih.gov/record/ui?ui=D000085822) |
| [Reinfection](https://meshb.nlm.nih.gov/record/ui?ui=D000084063) |
| [Return to School](https://meshb.nlm.nih.gov/record/ui?ui=D000084722) |
| [Teleworking](https://meshb.nlm.nih.gov/record/ui?ui=D000085326) |
| [Viral Envelope](https://meshb.nlm.nih.gov/record/ui?ui=D000086942) |
| [Viral Genome Packaging](https://meshb.nlm.nih.gov/record/ui?ui=D000086482) |
| [Viral Packaging Sequence](https://meshb.nlm.nih.gov/record/ui?ui=D000086502) |
| [Viral Papain-like Proteases](https://meshb.nlm.nih.gov/record/ui?ui=D000086062) |
| [Viral Replicase Complex Proteins](https://meshb.nlm.nih.gov/record/ui?ui=D000086902) |
| [Viral Replication Compartments](https://meshb.nlm.nih.gov/record/ui?ui=D000086969) |
| [Viral Transcription](https://meshb.nlm.nih.gov/record/ui?ui=D000087002) |
| [Viral Zoonosis](https://meshb.nlm.nih.gov/record/ui?ui=D000086965) |

#### Special MeSH Projects

##### **New and Updated Behavioral and Social Science Headings:**

As part of an ongoing project to incorporate terminology from the NIH Office of Behavioral and Social Sciences Research into the MeSH vocabulary, new entry terms and MeSH headings were created.

For example, new entry terms:

* Alcohol Problem was added as an entry term to [Alcohol-Related Disorders](https://meshb.nlm.nih.gov/record/ui?ui=D019973)
* Anxiousness was added as an entry term to [Anxiety](https://meshb.nlm.nih.gov/record/ui?ui=D001007)
* Child Well-Being (and spelling variants) was added as an entry term to [Child Health](https://meshb.nlm.nih.gov/record/ui?ui=D000067576)

For example, new Headings:

* [Economic Factors](https://meshb.nlm.nih.gov/record/ui?ui=D000083684)
* [Gender Equity](https://meshb.nlm.nih.gov/record/ui?ui=D000084803)
* [Social Cognition](https://meshb.nlm.nih.gov/record/ui?ui=D000083282)
* [Social Factors](https://meshb.nlm.nih.gov/record/ui?ui=D000083663)
* [Social Inclusion](https://meshb.nlm.nih.gov/record/ui?ui=D000083644)
* [Social Interaction](https://meshb.nlm.nih.gov/record/ui?ui=D000083505)

## New Cardiovascular Headings**:**

* [Aortic Valve Disease](https://meshb.nlm.nih.gov/record/ui?ui=D000082862)
* [Aortico-Ventricular Tunnel](https://meshb.nlm.nih.gov/record/ui?ui=D000082903)
* [Bicuspid Aortic Valve Disease](https://meshb.nlm.nih.gov/record/ui?ui=D000082882)
* [Cardiac Papillary Fibroelastoma](https://meshb.nlm.nih.gov/record/ui?ui=D000084122)
* [Hemorrhagic Stroke](https://meshb.nlm.nih.gov/record/ui?ui=D000083302)
* [Ischemic Stroke](https://meshb.nlm.nih.gov/record/ui?ui=D000083242)
* [Thrombotic Stroke](https://meshb.nlm.nih.gov/record/ui?ui=D000083244)

## New Food and Beverage Headings**:**

* [Food Deserts](https://meshb.nlm.nih.gov/record/ui?ui=D000085584)
* [Food Insecurity](https://meshb.nlm.nih.gov/record/ui?ui=D000084884)
* [Food Security](https://meshb.nlm.nih.gov/record/ui?ui=D000082302)
* [Sustenance](https://meshb.nlm.nih.gov/record/ui?ui=D000084902)
* [Water Insecurity](https://meshb.nlm.nih.gov/record/ui?ui=D000085222)

## New Infection Headings**:**

* [Bacterial Zoonoses](https://meshb.nlm.nih.gov/record/ui?ui=D000086966)
* [Blood-Borne Infections](https://meshb.nlm.nih.gov/record/ui?ui=D000086982)
* [HIV Testing](https://meshb.nlm.nih.gov/record/ui?ui=D000082922)
* [Latent Infection](https://meshb.nlm.nih.gov/record/ui?ui=D000085343)
* [Reinfection](https://meshb.nlm.nih.gov/record/ui?ui=D000084063)
* [Viral Zoonoses](https://meshb.nlm.nih.gov/record/ui?ui=D000086965)

## New Persons Headings**:**

* [American Natives](https://meshb.nlm.nih.gov/record/ui?ui=D000086562)
* [Indigenous Canadians](https://meshb.nlm.nih.gov/record/ui?ui=D000086682)
* [Metal Workers](https://meshb.nlm.nih.gov/record/ui?ui=D000085924)
* [Psychotherapists](https://meshb.nlm.nih.gov/record/ui?ui=D000082383)

## NLM Classification Update

### NLM Classification Redesign

Beginning with the 2020 summer edition, the NLM Classification has a new look and feel. With this new design comes a new URL (<https://classification.nlm.nih.gov/>). The old URL (https://www.nlm.nih.gov/class) will automatically be redirected to the new one. The new site functions best in Chrome or Firefox. The PDF version of the NLM Classification was discontinued with the 2020 edition due to low usage.

#### New features

The look may be different, but the organization structure of schedules and index pages remains the same. Some new features include:

* No search boxes on the home page. Users can access searches of the schedules via the navigation bar at the top right corner.
* Links to documentation have been rearranged and updated.
* Users are able to refine searches by choosing a search type:
  + **Exact** – search for word(s)/class number(s) in exact order
  + **Contains** – search for words that appear in relative proximity
  + **Startswith** – search for word(s)/class number(s) that begins with search term
* Schedule range headers are displayed on the left side of the schedule page rather than at the top.
* Index entries are displayed in a collapsed form. Where applicable, the user must click on the plus sign to expand and view the entire index entry.

For more details see the Help Instructions for the NLM Classification Public Pages.

### Scope of Revision of the 2020 Summer Edition

The major focus of the 2020 summer edition was the systematic review of the following schedules: WD (Disorders of Systemic, Metabolic or Environmental Origin, etc.) and WO (Surgery). In addition to the systematic reviews of the WD and WO schedules, other minor additions and changes were made. See [NLM Technical Bulletin September-October 2020](https://www.nlm.nih.gov/pubs/techbull/so20/so20_nlm_classification_summer_2020.html).

#### Highlights from the WD (Disorders of Systemic, Metabolic or Environmental Origin, etc.)

A partial review of the WD schedule was already conducted with the 2019 summer edition systematic review to consolidate certain subjects in the QW and other schedules. The review of the rest of the WD schedule was completed with the 2020 summer edition. As a result, the following changes were made (Selected set):

* The WD Schedule Header was changed from *Disorders of Systemic, Metabolic or Environmental Origin, etc.* to *Medicine in Selected Environments.*
* WD 100-175 *Nutrition Disorders* cancelled:
  + New section created in QU schedule for *Nutrition Disorders*
  + Vitamin deficiencies are now classed with the actual vitamins
  + Vitamins QU 167-181 separated from *Nutrition* header in the QU schedule and made an independent section
  + *Celiac Disease. Sprue* moved to the new number WI 471, indented under the new number WI 470 *Malabsorption syndromes* (formerly WD 200.5.M2)
* WD 200-205 *Metabolic Diseases* New section created in QU schedule for *Metabolic Diseases*
* WD 220-226 *Water-Electrolyte Imbalance* New section created for *Water-Electrolyte Imbalance*. *Acid-Base Imbalance*. Two separate class numbers were created for the two imbalances: QU 270 and QU 274. Works on regular balance are classified in QU 105.
* WD 300-380 *Connective Tissue Diseases* (Note: Several numbers in the WD 300-330 Immune System Related Diseases area had already been cancelled with 2019 summer edition.) *Connective Tissue Diseases and Collagen Diseases* moved to new section: QZ 192-196.
* WD 600-670 *Disorders and Injuries of Environmental Origin*
  + *Persian Gulf Syndrome* moved to new number QZ 146 *Syndromes*
  + *Electric Injuries* and *Cold Injuries* moved to WO schedule
  + Several revisions made to QT 162 area:
    - Many disorders moved from WD to QT 162 with *Environmental factors acting on human physiology,* e.g., *Motion Sickness* classed with *Motion*
  + *Submarine medicine* moved to new number under *Naval Medicine* section
* *Wilderness Medicine* New section header and one number created: WD 680
* WD 700-745 header broadened: changed from *Aviation Medicine* to *Aerospace Medicine*. Other changes in this section:
  + 1 number cancelled: WD 745 *Aviation dentistry*
* WD 750-760 header changed from *Space Medicine* to *Space Flight*
* WD 800 *Naval Medicine* section enhanced:
  + New numbers created for *Submarine Medicine*
  + New number created for Collective Biography of Naval Personnel WZ 112.5.N2
* WB 116 *Military Medicine* New section created for *Military Medicine* at WD 900
  + Naval medicine schools are classed in WD 919 with *Military Medicine*

#### Highlights from the WO (Surgery)

The WO Schedule Header was changed from *Surgery* to *Wounds and Injuries*

14 New WO numbers created

WO 320 Nerve block

WO 502 Surgical hemostasis

WO 504 Electrosurgery

WO 508 Ablation techniques

WO 595 Cosmetic techniques

WO 662 Tissue and organ procurement. Tissue donors

WO 664 Cell- and tissue-based therapy

WO 705 Cold injury

WO 720 Asphyxia

WO 730 Multiple trauma

WO 750 Emergency Surgery

WO 780 War-related injuries (General)

WO 810 Stab wounds

WO 840 Electric injuries

#### Other 2020 Summer Edition Changes

Selected examples of additional changes made:

##### Classification of Safety in Clinical Laboratories

QY 70 was expanded to include administrative aspects of clinical laboratories including standards. A new number, QY 75 *Laboratory Safety*, was created specifically for safety in laboratories. Several index terms were modified to add sub-indexes about safety and administrative aspects. New term added to index: *Laboratory Proficiency Testing*.

##### W1 versus specific schedules for Reports of Societies

Reports of an administrative nature, regardless of how often they are issued, should be classed with the society. Edits were made to notes across all the schedules at form number 1.

### Scope of Revision of the 2021 Winter Edition

The 2021 Winter Edition of the NLM Classification was published on February 12, 2021. The 2021 MeSH vocabulary was evaluated for inclusion in the Classification index. Several additions and changes were made to the Index and Schedules based on this review. All main index headings are now linked to the 2021 vocabulary in the MeSH Browser. Additional minor updates were made to the Index and Schedules. See [NLM Technical Bulletin January-February 2021](https://www.nlm.nih.gov/pubs/techbull/jf21/jf21_nlm_classification_winter_2021.html)

#### Summary of COVID-19 related changes

* The virus, **SARS-CoV-2,** was added to an existing number, QW 168.5.C8 Coronaviridae
* The disease, **COVID-19**, was added to the index at a new number in the viral respiratory tract infections area: WC 506.
* A new nursing number was created for COVID-19 nursing: WY 153.7
* **COVID-19 Testing** was added to the index and classed at one of the new COVID-19 ~~A-Z~~ numbers: WC 506.1 Diagnosis.
* **COVID-19 Vaccines** was added to the index and classed at one of the new COVID-19 numbers: WC 506.6

#### Other Diagnosis Terms Added

* **HIV Testing** WC 503.1 (classed with HIV/AIDS diagnosis)
* **Clinical Reasoning** WB 142.5

#### Gender Terms added

**Gender Equity** HQ 1237 - HQ 1237.5

**Gender Role** HQ 1075-1075.5

#### Social Terms added

* **Social Evolution** HM 626-631
* **Social Inclusion** HM 683
* **Social Interaction**

General HM 1111

Adolescent WS 462.5.S6

Child WS 105.5.S6

#### Sexual Terms added

* **Sexual Arousal**

General WJ 702

Female WP 505

Male WJ 702

* **Sexual Selection** QU 520
  + 2007 term **Mating Preference, Animal** (which has Entry Term **Sexual Selection, Animal)** was added to index at QL 761 to differentiate
* **Sexual Trauma**

A new number was created for Sexual Trauma at WM 187

#### Nursing Terms added

* **Developmental Disability Nursing** WY 172 (new number)
* **Trauma Nursing** WY 154.2

#### Food Terms added

* Three new food terms were added to the index classed at WA 695
  + **Food Deserts**
  + **Food Insecurity**
  + **Food Security**

#### Internet Terms

Two new internet terms were added to Index

* **Internet Addiction Disorder**

General WM 176

Adolescent WS 462.5.T4

Child WS 105.5.T4

* **Internet Use**

Effect on adolescents WS 462.5.T4

Effect on children WS 105.5.T4

See also Internet Addiction Disorder

#### Main Index Headings Changes Based on MeSH 2021

For 2021, of the 14 MeSH headings were either changed or deleted and replaced with more up-to-date terminology, only five affected the NLM Classification

|  |  |
| --- | --- |
| **Replaced Term** | **Replaced-By Term** |
| Alaska Natives | [Alaskan Natives](https://meshb.nlm.nih.gov/record/ui?ui=D000072957) |
| Bonding, Human-Pet | [Human-Animal Bond](https://meshb.nlm.nih.gov/record/ui?ui=D001841) |
| Clostridium difficile | [Clostridioides difficile](https://meshb.nlm.nih.gov/record/ui?ui=D016360) |
| Mentally Disabled Persons | [Persons with Mental Disabilities](https://meshb.nlm.nih.gov/record/ui?ui=D019989) |
| Respiratory Distress Syndrome, Adult | [Respiratory Distress Syndrome](https://meshb.nlm.nih.gov/record/ui?ui=D012128) |