Cancer PathCHART:
What Registrars Need to Know for 2024

This presentation has been approved by NCRA for

1 continuing education credit hour (1 CE)

Of that hour, 0.5 CE meet *Category A* requirements

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Cancer PathCHART:
What Registrars Need to Know for 2024

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“The Future of Site-Morphology Standards”

Jim Hofferkamp, BS, CTR
“Cancer PathCHART Edits”

September 2023

NATIONAL CANCER INSTITUTE
Division of Cancer Control & Population Sciences

Cancer PathCHART: the Future of Site-Morphology Standards

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September 2023

Conflicts of Interest & Disclosures

I have no conflicts of interest or other financial disclosures to declare

Presentation Objectives

- Understand what CPC is & how updated standards were developed
- Know how CPC standards will benefit registrars & will or will not impact coding of tumor site, histology, & behavior
- Understand 2024 CPC ICD-O-3 Site-Morphology Validation List
- Know plans for implementation of updated CPC standards in 2024
- Be aware of existing & planned resources for registrars

Cancer PathCHART Acronym

- **C**ancer
- **Path**ology
- **C**oding
- **H**istology
- **A**nd
- **R**egistration **T**erminology

Collaborating Organizations

International Agency for Research on Cancer

World Health Organization

National Cancer Registrars Association

NAACCR

SEER

NPCR

NATIONAL PROGRAM of CANCER REGISTRIES

Commission on Cancer®

Statistics Canada

Statistique Canada

IACR

International Association of Cancer Registries

ICCR

International Collaboration on Cancer Reporting

COLLEGE of AMERICAN PATHOLOGISTS

AJCC

American Joint Committee on Cancer

100+years

Cancer PathCHART

Cancer Surveillance Standards

Language in Pathology Reports

Cancer Registrar

Picture Link

Modified from: U.S. Department of Transportation, Federal Highway Administration. Accessed April 28, 2023

Problems Being Addressed

Data Quality Issues

Variation in terminology and understanding among

- Cancer Registrars
- Clinicians
- Pathologists
- Researchers
- Public Health Officials

Consequences

Inconsistent Cancer Surveillance Data

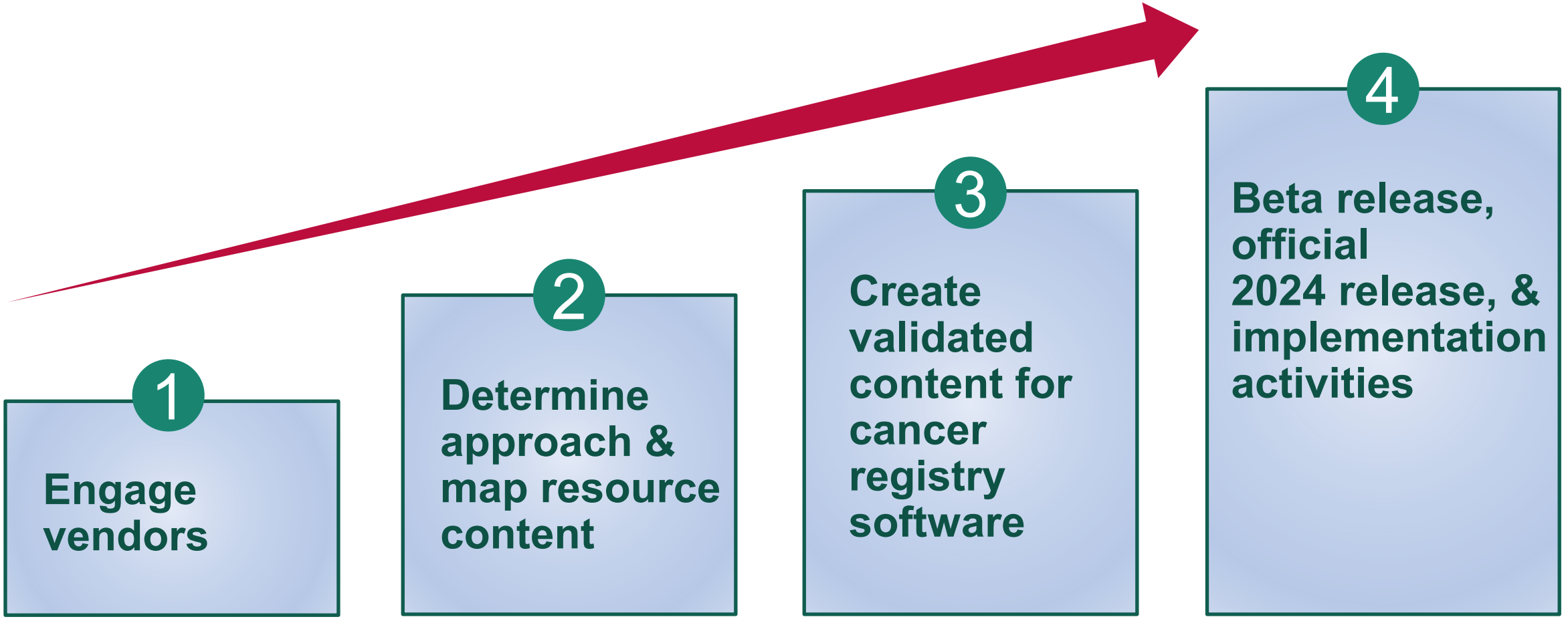
Impact Public Health

- Program Funding
- Prevention Program Planning
- Research Funding

Vision & End Goals

- Coordinated standards across stakeholders for tumor
  - Histology terms
  - Histology, behavior, & topography codes
- One source of truth for cancer surveillance site & morphology codes and terms
- Reducing differences between WHO, pathology, & cancer registration
- Decreased implementation timeline
- Improved public health data quality

Where is Cancer PathCHART now?



How will Cancer PathCHART affect my daily work?

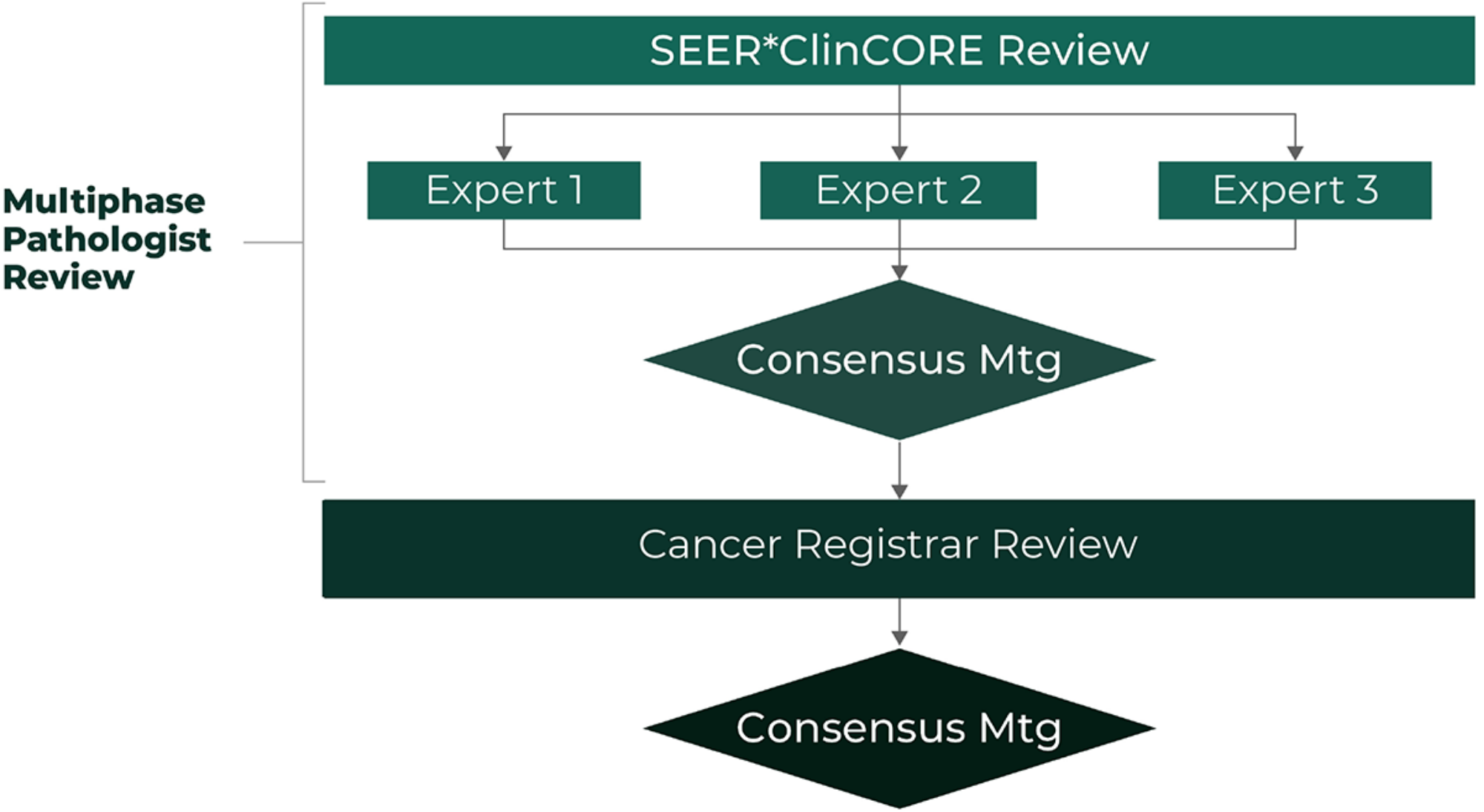
No Impact On

- WHO does what in your registry
- WHAT you do on a daily basis in your registry
- WHY you need the information

What Will Cancer PathCHART Achieve?

- More streamlined and timely process for implementation of this information within your cancer registry software
- Aligned with
  - *Solid Tumor Rules*
  - Hematopoietic Database
  - Other coding resources

Interdisciplinary Review Process



Multiphase Pathologist Review

Expert Pathologist Review

Independent Review by 3 Expert Pathologists

Consensus Among Pathologists

Consensus Among Cancer Registrar and Pathologists

Pathologist Reviewer Decisions

Biologically Valid

No further review needed

Example
Adenocarcinoma of the colon & rectum

Biologically Unlikely

Histology is unlikely in this site/organ system and may be an error

Example
Squamous cell carcinoma in situ of the rectum (more likely of the anal canal)

Biologically Impossible

Cancer registrars cannot record this combination in the cancer registry database

Example
Hepatocellular carcinoma of the prostate

Send for Consensus

Determination to be made via consensus among multiple pathologists and CTRs

Registrar Review Algorithm

Pre-CPC Status	CPC Pathologist Biological Decision/WHO	Change Type/No Change	CTR Review
Valid per Site/Type List	Valid	No change	No
Valid per Site/Type List	Unlikely	Removal from Site/Type List Create an Edit	Yes
Valid per Site/Type List	Impossible	Removal from Site/Type List Addition to Impossible List	Yes
Edit overridden	Valid	Removal of Edits Addition to Site/Type List	No
Edit overridden	Unlikely	No change	No
Edit overridden	Impossible	Removal from Edits Addition to Impossible List	Yes
Impossible List	Valid	Removal from Impossible List Addition to Site/Type List	No
Impossible List	Unlikely	Removal from Impossible List Create an Edit	No
Impossible List	Impossible	No change	No

Registrar Review Process

- Clarifications to expert pathologists about changes to validity of site-histology combinations
- Compare alignment of pathologists' recommendations for alignment with coding rules
- Incorporate answers to histology coding questions for issues submitted to
  - ✓SEER Inquiry System (SINQ)
  - ✓Ask A SEER Registrar

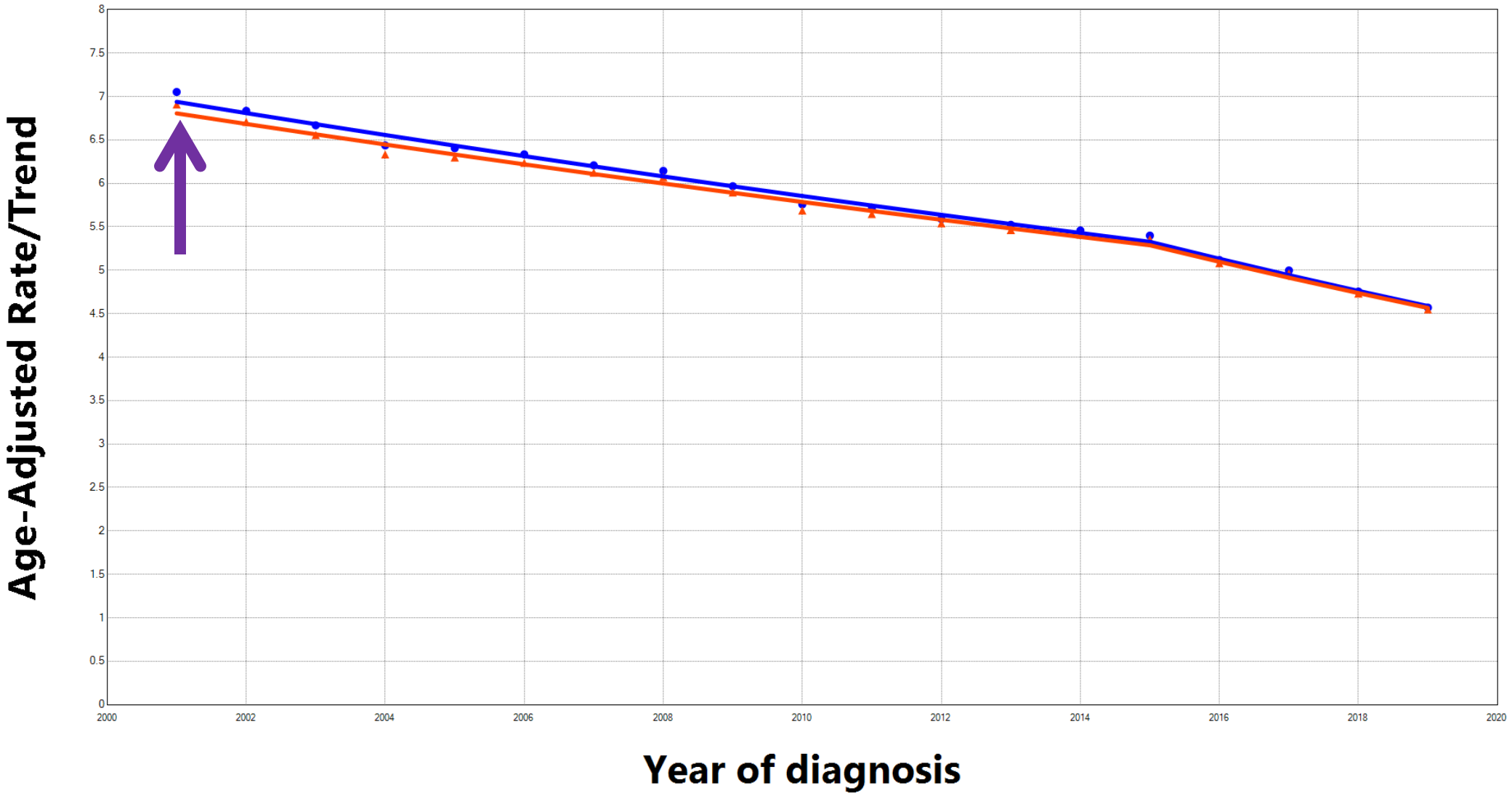
Ovary

Before Review	# Hist	2019 USCS Count	%	Expert Review Designation	# Hist	2019 USCS Count	%
SEER Site/Type Validation List	107	17,932	99.0	Valid	64	17,806	98.7
				Unlikely	3	9	<0.1
				Impossible	40	117	0.6
Manual Review/Override	228	110	1.0	Valid	5	4	<0.1
				Unlikely	40	33	0.2
				Impossible	183	73	0.4
Impossible	3	0	0	Valid	0	0	0
				Unlikely	0	0	0
				Impossible	3	0	0
New WHO Code/Term	7	0	0	Valid	0	0	0
				Unlikely	0	0	0
				Impossible	7	0	0
Total	**345**	**18,042**	**100**	**Total**	**345**	**18,042**	**100**

Previously Valid Ovarian Histologies Deemed Impossible - examples

Morphology	ICD-O-3.2 Term	Count
8051/3	Verrucous carcinoma, NOS	0
8052/2	Papillary squamous cell carcinoma, non-invasive	0
8070/2	Squamous cell carcinoma in situ, NOS	41
8230/2	Ductal carcinoma in situ, solid type	0
8261/2	Adenocarcinoma in situ in villous adenoma	0
8261/3	Adenocarcinoma in villous adenoma	0
8262/3	Villous adenocarcinoma	4
8263/2	Adenocarcinoma in situ in tubulovillous adenoma	0
8263/3	Adenocarcinoma in tubulovillous adenoma	21
8510/3	Medullary carcinoma, NOS	2

Valid or Override Histologies of the Ovary



Planned Initial 2024 Work Products

CPC ICD-O-3 Site-Morphology Validation List

- Valid combinations (can be entered)
- Impossible combinations (cannot be entered)
- Incorporated into NAACCR site-type edits

Future 2024 CPC Standards Search Tool

- Valid & impossible combinations
- Unlikely combinations (trigger site-type edit)
- Codes & associated terminology

Planned Initial Work Products

Continued

CPC SMVL Standardized Formats for End Users

- Freely available on SEER website
- Easily-consumable formats (Excel, CSV)
- Other formats requested by cancer registry software vendors (Ex: XML, JSON)
- Integrated into data quality edits, SEER API, CDC DLL, etc.

https://seer.cancer.gov/cancerpathchart/products.html

2024 CPC SMVL

Status Codes

1 = Valid

3 = Impossible

A	B	C	D	E	F
Key	FullKey	C_Site	Hist	Behavior	Status
80003	C00080003	C000	8000	3	1
80013	C00080013	C000	8001	3	1
80023	C00080023	C000	8002	3	1
80033	C00080033	C000	8003	3	1
80043	C00080043	C000	8004	3	1
80053	C00080053	C000	8005	3	1
80102	C00080102	C000	8010	2	1
80103	C00080103	C000	8010	3	1
80113	C00080113	C000	8011	3	1
80123	C00080123	C000	8012	3	1
80133	C00080133	C000	8013	3	1
80143	C00080143	C000	8014	3	1
80153	C00080153	C000	8015	3	1
80203	C00080203	C000	8020	3	1
80213	C00080213	C000	8021	3	1
80223	C00080223	C000	8022	3	1
80303	C00080303	C000	8030	3	1
80313	C00080313	C000	8031	3	1
80323	C00080323	C000	8032	3	1
80333	C00080333	C000	8033	3	1
80343	C00080343	C000	8034	3	1
80353	C00080353	C000	8035	3	1

Compact | FullData | Notes

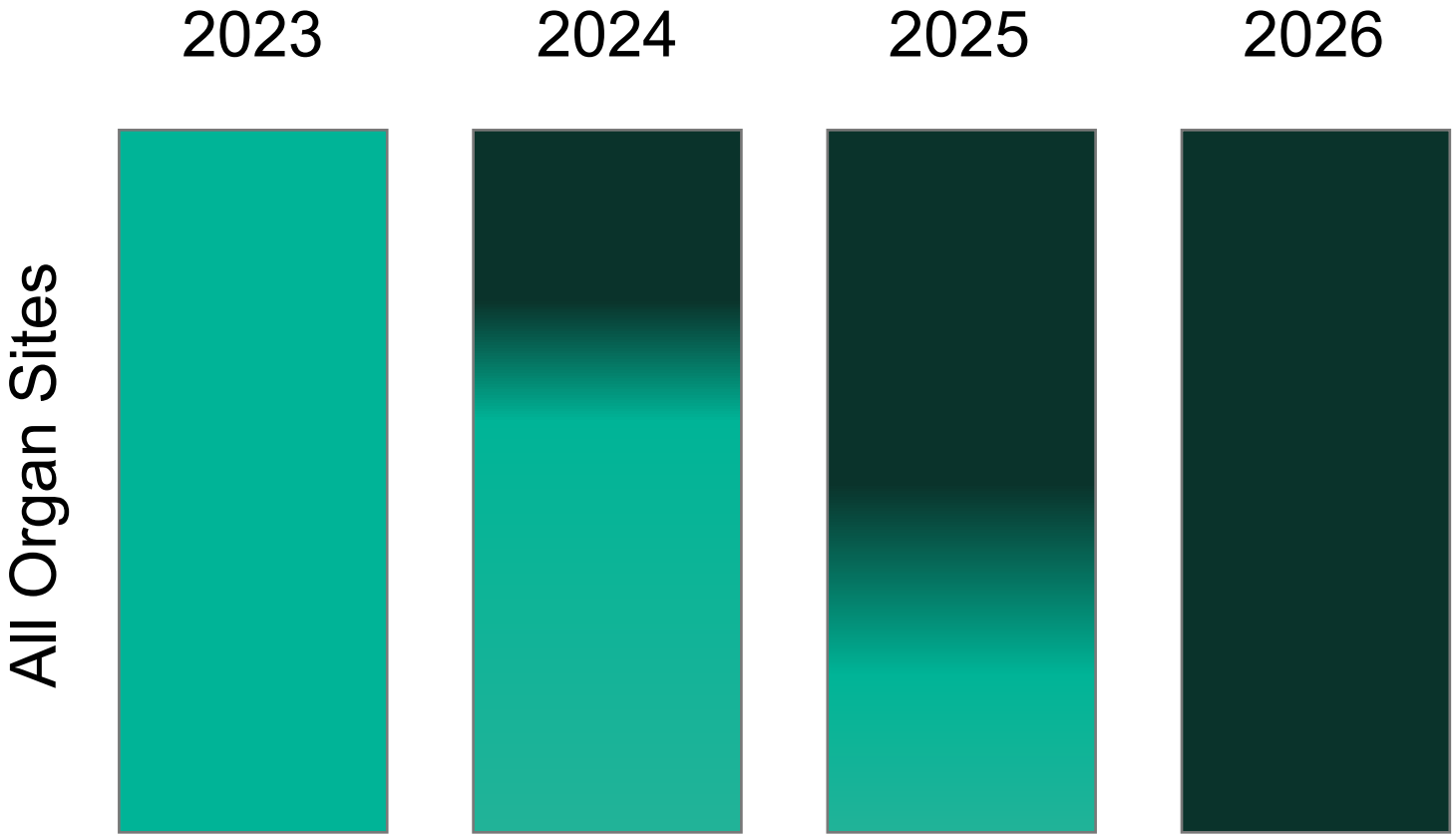
Reviews Completed for 2024 Implementation

Organ System	Sites
Digestive	Ampulla of Vater; Anus; Appendix; Biliary System; Colon & Rectum; Esophagus; Gallbladder; Liver; Pancreas; Small Intestine; Stomach
Bone & Soft Tissue	Bones & Joints; Connective, Subcutaneous & Other Soft Tissue
Breast	Breast
Female Genital	Cervix; Endometrium; Fallopian Tube; Myometrium; Ovary; Vagina; Vulva, Adnexa & Other Female Genital; Placenta
Male Genital	Penis; Prostate; Testis
Urinary	Kidney

Implementation Timeline

Cancer PathCHART Updated Standards

Previous Standards



Resources for Registrars

- Informational website

  URL: https://seer.cancer.gov/cancerpathchart/

- Future updates & planned registrar resources
  - Launch 2024 CPC ICD-O-3 Site Morphology Validation List (CPC SMVL) search tool
  - Recorded demonstration on tips for using CPC SMVL search tool
  - Recorded presentation about how Cancer PathCHART standards fit with other registrar resources (*Solid Tumor Rules*, Heme Database, SINQ, & Ask A SEER Registrar)
  - How to report issues with the standards

What We Have Accomplished

- Established an infrastructure for
  - Interdisciplinary review of new entities & products as released
  - Reduced timeline to implementation
- Baseline review being conducted
  - First extensive update in over 15 years
  - Outdated terms are still being used in medical practice
- Impact on statistics of small changes in even rare cancer histologies & cancers at uncommon sites

Future Webtool

- Future freely available on SEER website
- Searchable database by site and/or histology, and/or term
- Mapped site-specific histology terminology & coding across
  - Stakeholder standards at a given timepoint
    - Ex: Melanoma terminology in WHO vs. CAP protocols
  - Standards over time for a given stakeholder
    - Ex: Sarcomas in different editions of *WHO Classification of Tumours*

Accurate Data are Important!

- Registrar efforts to assure accurate and complete data
  - Provide useful data for research
  - Provide outcomes and survival assessments
  - Guide public health decisions

Thank you for all you do!

Initiative operations & acknowledgements

Core Management Team

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Alison Van Dyke
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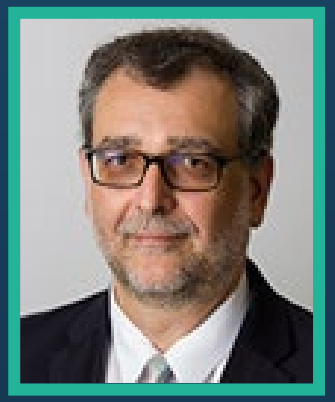

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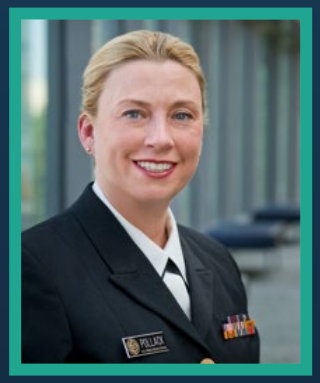

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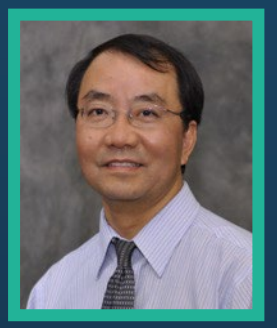

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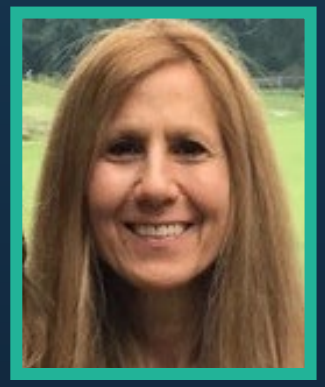

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For More Information

Visit the Cancer PathCHART website today!

https://seer.cancer.gov/cancerpathchart/