

Canadian (CA) Supplemental Exam Candidate Handbook

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Canadian (CA) Supplemental Certification Program

The Canadian Supplemental (CA) Exam covers competencies that aren't part of the **Certified Professional in Healthcare Information and Management Systems** (CPHIMS Exam), plus competencies that require a higher level of understanding for the Canadian context.

The Digital Health Canada CA certification program promotes the healthcare information and management systems field through certification of qualified individuals and the following program elements:



Formal recognition of those individuals who meet the CA eligibility requirements and have passed the examination.



Requiring certification renewal through continued personal and professional growth in the practice of healthcare information and management systems.



Setting a national standard of requisite knowledge for certified healthcare information and management systems professionals that guides employers, the public, and health professionals.

CA Eligibility Requirements

Exam candidates must meet the requirements from **ONE** of the categories below:

1	- OR -	2	- OR -	3
 +  BACHELOR DEGREE 5 YEARS		 +  GRADUATE DEGREE 3 YEARS		 10 YEARS
<p>Baccalaureate degree from an accredited college or university plus five years of information and management systems¹ hands-on work experience, with at least three of those years in a healthcare setting².</p>		<p>Graduate degree or higher from an accredited college or university plus three years of information and management systems¹ hands-on work experience, with at least two of those years in a healthcare setting².</p>		<p>NEW: Ten years of information and management systems¹ hands-on work experience, with at least eight of those years in a healthcare setting².</p>

NEW: Candidates without a degree, or whose degree was not awarded in the past five years, will need to document at least 45 hours of continuing education in healthcare information technology, digital health, or informatics, specifically covering content found on the CPHIMS Detailed Content Outline. Candidates will be required to submit a current CV or resume supporting their experience, along with official documentation of their current job description, as well as a listing of the 45 hours of continuing education, should their degree be over five years old. Documents are subject to random audit and verification.

¹Information and management systems experience refers to work experience in systems analysis; design; selection, implementation, support, and maintenance; testing and evaluation; privacy and security; information systems; clinical informatics; management engineering.

²A healthcare setting is defined to include experience with a provider of health services or products to a healthcare facility (e.g., hospital; healthcare consulting firm; vendor; federal, state, or local government office; academic institution; payer; public health, etc.).

CA Examination Structure



- Composed of 50 multiple-choice questions. A candidate's score is based on 45 of these questions. Fifteen (15) 'trial' or 'pretest' questions are interspersed throughout the examination.



- A candidate is allowed one (1) hour in which to complete the CA Examination.



- The CA Examination is based on the five (5) major content areas listed in the content outline on page four of this handbook.
- CA Examination questions are categorized by the following cognitive levels:
 - > **Recall (RE):** ability to recall or recognize specific information
 - > **Application (AP):** ability to comprehend, relate or apply knowledge to new or changing situations
 - > **Analysis (AN):** ability to analyze and synthesize information, determine solutions or evaluate the solution

CA Examination Content Outline

Domain

of Questions

INFORMATION MANAGEMENT

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- Advances the management of information as a key strategic resource.
 - Demonstrates an understanding of the key attributes of data and information (e.g. quality, integrity, accuracy, timeliness, appropriateness) and their limitations within the context of intended uses.
 - Determines appropriate data sources and gaps in data sources in relation to identified business needs across the healthcare system.
 - Demonstrates an understanding of the data interrelationships and dependencies among the various health information systems (e.g. decision support systems, electronic health records, order entry, registries, etc).
 - Demonstrates an understanding of the implications of ethical, legislative, and regulatory requirements related to the management of health information.
 - Applies accepted policies, principles and guidelines for the management of health information (e.g., Digital Health Canada Guidelines and Canadian Health Information Management Association practices).
 - Demonstrates an understanding of relevant health information standards and their appropriate use (e.g. classifications, vocabularies, nomenclature, etc)
 - Integrates data quality principles and methodologies into the identification, use and management of information sources (people and systems).
-

INFORMATION TECHNOLOGY

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- Demonstrates an understanding of key information technology concepts and components (e.g., networks, storage devices, operating systems, information retrieval, data warehousing, applications, firewalls, etc.)
 - Engages relevant stakeholders at the appropriate stages of the system life cycle.
 - Addresses information, business, and technical requirements to meet the full range of stakeholders' information needs.
 - Contributes to the selection and utilization of appropriate information technologies to meet business requirements.
 - Applies appropriate health informatics standards and enterprise models to enable system interoperability (e.g., terminology, data structure, system to system communication, privacy, security, safety).
 - Applies knowledge of health data and information workflow models to information technology solutions.
 - Applies information technology best practices (e.g., quality management systems, testing, service level agreements, business continuity and incident management) throughout the system life cycle.
 - Applies best practices and solutions required to manage the security of data, systems, devices and networks. (e.g. Digital Health Canada Guidelines for the Protection of Health Information).
 - Demonstrates an understanding of architectural relationships between key health information technology components and best practices in enterprise architecture frameworks/perspectives.
-

CLINICAL & HEALTH SERVICES

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- Applies knowledge of basic clinical and biomedical concepts, clinical care processes, technologies and workflow for purposes of analysis, design, development and implementation of health information systems and applications.
- Understands basic clinical terminology and commonly used abbreviations and acronyms.
- Recognizes commonly used formats, structures and methods for recording and communicating clinical data and how these are incorporated into system and application use.
- Fosters the adoption and use of health information systems in clinical settings.
- Facilitates appropriate consumer use of health information and communication technologies.
- Assesses and mitigates clinical safety risks associated with health information and systems throughout the system life cycle.
- Facilitates clinicians' use of electronic decision support tools in accessing evidence to support practice.

CANADIAN HEALTH SYSTEM

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- Demonstrates knowledge of health and health systems in Canada and appropriately applies this information to work products and services, including:
 - > Key characteristics (e.g. governance, funding, structures, agencies, related organizations, emerging trends, etc.)
 - > Determinants of health (e.g. environment, genetics, socioeconomic), and
 - > Key factors affecting healthcare (e.g., demographics, new technologies, incentives).
-

CANADIAN HEALTH SYSTEM *(continued)*

- Demonstrates knowledge of the way HI benefits are realized and measured in the Canadian healthcare system.
- Demonstrates an understanding of different types of Canadian healthcare delivery models across the continuum of care and their interrelationships (e.g. hospitals, clinics, ambulatory centres and community health agencies, regional health authorities).
- Demonstrates knowledge of how people, resources and information flow through the health system.
- Applies knowledge of the roles and relationships of health professionals along with the organizational and regulatory structure in which they work.
- Addresses the challenges related to the adoption and realization of clinical value of information systems in the health sector.
- Understands the need to balance the privacy of personal health information with improved care delivery and health system management.
- Promotes the safe and appropriate use of health information technologies to ensure patient safety

**ORGANIZATIONAL & BEHAVIOURAL MANAGEMENT;
PROJECT MANAGEMENT**

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- Applies the basic theories, concepts and practices of management including:
 - > Organizational behaviour and culture
 - > Human resources
 - > Financial and budget management
 - > Governance, accountability, risk analysis and management
 - > Procurement and vendor relationships, and
 - > Customer relationships

**ORGANIZATIONAL & BEHAVIOURAL MANAGEMENT;
PROJECT MANAGEMENT** *(continued)*

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- Contributes to organizational plans and strategies to ensure that information and systems enable business goals and strategy.
 - Promotes an information culture by facilitating appropriate uses of information and knowledge.
 - Facilitates self, individual, team and organizational learning and development through the use of appropriate technologies, communication channels and organizational skills.
 - Uses audience-appropriate communication and language to present information and convey concepts to relevant stakeholders.
 - Applies best practices in quality improvement, process improvement and process engineering to facilitate business and clinical transformation.
 - Contributes to ongoing evaluation of the functionality of systems so that they can evolve to support best practice in clinical care.
 - Applies best practices of change management in the implementation of new processes or systems.
 - Integrates Digital Health Canada's ethical principles into daily practice (see Guide to Digital Health in Canada, p. 197).
 - Applies project management principles and best practices (e.g. project charter, scope, life, cycle, budgets, resourcing, timelines, milestones, monitoring, status reports).
 - Works collaboratively and contributes to project planning, implementation, monitoring and evaluation.
 - Anticipates issues and opportunities and mitigates risks associated with projects.
-

Taking the CA Examination



After identity of the CA candidate has been verified, the candidate is directed to a testing station. Candidates are provided one sheet of scratch paper that must be returned to the examination proctor at the completion of testing. Failure to do so will result in the test score report not being released.

The CA candidate is provided instructions on-screen. Prior to attempting the CA Examination, the candidate is provided a short tutorial on using the software to take the examination. Tutorial time is NOT counted as part of the one (1) hour allowed for the examination. Only after a candidate is comfortable with the software and chooses to start the examination does the examination time begin.



The computer monitors the time spent on the examination. The CA Examination terminates at the one (1)-hour mark. There is a timer available on each screen that indicates the time remaining.



Only one CA examination question is presented at a time with four options to select from. Candidates select an answer by using the mouse to “click” the selected option, highlighting it. To change an answer, the candidate simply selects another option. An answer may be changed multiple times.



To move to the next question, the candidate will click on the “Next” button in the lower right corner of the screen. This action allows the candidate to move forward through the CA Examination question by question.



A CA Examination question may be left unanswered for return later in the testing session. Questions may also be “bookmarked” for later review.



When the CA Examination is completed, the number of CA Examination questions answered is reported.

If fewer than 50 questions were answered and time remains, the candidate may return to the CA Examination and answer the remaining questions. Each examination question must be answered before ending the examination.

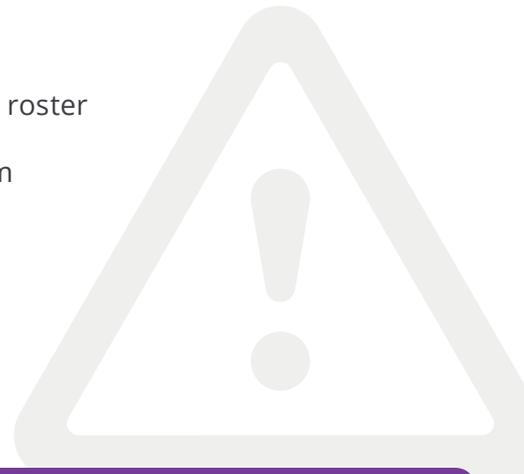
Rules for CA Examination

All CA Examination candidates must comply with the following rules during the CA Examination administration:

- ➔ No personal items (including watches, hats and coats), valuables or weapons should be brought into the testing room. Only keys, wallets and items required for medical needs are permitted. Books, computers, or other reference materials are strictly prohibited. If personal items are observed or heard (e.g., cellular/smart phone, alarm) in the testing room after the examination is started, the examination administration will be forfeited. Digital Health Canada is not responsible for items left in the reception area.
- ➔ CA Examinations are proprietary. CA Examination questions may not be recorded or shared with any individual in any manner. No cameras, notes, tape recorders, pagers or cellular/smart phones or other recording devices are allowed in the testing room. Possession of a cellular/smart phone or other electronic devices is strictly prohibited and will result in dismissal from the CA Examination.
- ➔ Eating, drinking and smoking will not be permitted in the testing room.
- ➔ No documents or notes of any kind may be removed from the testing room. Candidates are provided one sheet of scratch paper for calculations that must be returned to the examination proctor at the completion of testing. Failure to do so will result in the test score report not being released.
- ➔ No questions concerning the content of the CA Examination may be asked of anyone during the CA Examination.
- ➔ Permission from the CA Examination proctor is required to leave the testing room during the examination. No additional time is granted to compensate for time lost.
- ➔ No guests, visitors or family members are allowed in the testing room or reception areas.

Candidates observed engaging in any of the following conduct during the CA Examination may be dismissed from the CA Examination session, their score on the CA Examination voided and the CA Examination fees forfeited. Evidence of misconduct is reviewed by Digital Health Canada to determine whether the CA candidate will be allowed to re-apply for the CA Examination. If re-examination is granted, a complete CA Examination application and full CA Examination fee are required.

- ❌ Gaining unauthorized admission to the CA Examination
- ❌ Creating a disturbance, being abusive or otherwise uncooperative
- ❌ Displaying and/or using electronic communications equipment including but not limited to pagers and cellular/smart phones
- ❌ Talking or participating in conversation with other CA Examination candidates
- ❌ Giving or receiving help or being suspected of doing so
- ❌ Leaving the testing room during the CA Examination
- ❌ Attempting to record CA Examination questions in any manner or making notes
- ❌ Attempting to take the CA Examination for someone else
- ❌ Having possession of personal belongings
- ❌ Using notes, books or other aids without it being noted on the roster
- ❌ Attempting to remove CA Examination materials or notes from the testing room



Renewal of CA Certification

Periodic renewal of CA Certification is required to maintain certified status and to demonstrate ongoing commitment to remaining current in the field. Initial certification or renewal of certification is valid for three (3) years.

Eligible candidates who successfully complete the CA Examination (and have passed the CPHIMS examination) are provided information about renewal requirements in a certification package sent by HIMSS. A copy of the CPHIMS-CA Renewal Requirements are available on the Digital Health Canada website. All applications for recertification must be completed online on the HIMSS website. **The CPHIMS-CA Renewal Application may be submitted up to six (6) months in advance but no later than 30 days prior to the expiration date listed on the certificate.**

Credential holders are responsible for monitoring their own recertification dates. As a courtesy, HIMSS e-mails notices to candidates of their pending certification expiration. Candidates are responsible for keeping their contact information accurate. HIMSS and Digital Health Canada are not responsible for communications not received due to incorrect contact information in a candidate's record.

Candidates may renew the CPHIMS-CA credential through one (1) of the following ways:

- **Successful re-examination.** To renew this way, successfully pass the CPHIMS and CA Examinations no more than six (6) months prior to expiration of your certification (subject to usual fees and provisions for testing). An additional Renewal fee is not required if a candidate selects this way to renew the designation.

- **Completion of 45 clock hours of continuing professional education** over the three (3)-year renewal period and payment of the renewal fee. To renew this way, submit a complete CPHIMS Renewal Application via their online HIMSS record with the appropriate fee and report all eligible continuing professional education activities that you completed during your renewal period. Eligible activities include attending professional organization conferences, completing on-line courses, and attending or teaching academic courses, among other activities. There is no limitation on the maximum allowable hours. Refer to the current Renewal Requirements for a description of eligible activities and other provisions for renewing your certification.

CPHIMS-CA Renewal Application processing requires eight (8) weeks. Candidates who meet the renewal requirements can print a new certificate of recognition listing the new certification expiration date from their online HIMSS record. Candidates are responsible for keeping current contact information in their membership record.



Failing to Renew

A candidate who fails to renew his/her CPHIMS-CA certification is no longer considered certified and may not use the CPHIMS-CA credential in professional communications including but not limited to letterhead, stationery, business cards, directory listings and signatures. To regain certification, the individual must retake and pass the CPHIMS and CA Examinations (subject to the usual fees and provisions for testing.)

Digital Health Canada connects, inspires, and educates the digital health professionals creating the future of health in Canada. Our members are a diverse community of accomplished, influential professionals working to make a difference in advancing healthcare through information and technology. Digital Health Canada fosters network growth and connection; brings together ideas from multiple segments for incubation and advocacy; supports members through professional development at the individual and organizational level; and advocates for the Canadian digital health industry.

For more information, visit digitalhealthcanada.com.



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