



PSI Services LLC
 3210 E Tropicana
 Las Vegas, NV 89121
www.psiexams.com



TENNESSEE BOARD FOR LICENSING CONTRACTORS



TENNESSEE CONTRACTORS CANDIDATE INFORMATION BULLETIN

CONTENT OUTLINE

Examinations by PSI	2	Business and Law	6
Examination Registration and Scheduling	2	*CMC-A - Mechanical Plumbing	7
Internet Registration	2	BC - Combined - Residential/Commercial/ Industrial Contractor	8
Fax Registration	2	BC-A - Residential Contractor	9
Standard Mail Registration	2	BC-B - Commercial Contractor	10
Telephone Registration	2	BC-b - Small Commercial Contractor	11
Scheduling an Examination	2	BC-C - Industrial Contractor	12
Reregistering for an Examination	3	BC-A, B - Combined - Residential/ Commercial Contractor	13
Canceling and Rescheduling an Examination	3	BC-A, b (sm) - Combined- Residential/Small Commercial Contractor	14
Missed Appointment or Late Cancellation	3	BC-B, C - Combined - Commercial/Industrial Contractor	15
Special Examination Arrangements	3	CE - Electrical Contractor	16
Examination Site Closing for an Emergency	3	*CMC - Full Mechanical Contractor	16
Social Security Number Confidentiality	3	CMC-C - Mechanical - HVAC/Refrigeration Contractor	17
Examination Site Locations	3	CMC-D - Mechanical - Fire Sprinklers and Fire Protection Contractor	18
Reporting to the Examination Site	4	CE-A, H - High Voltage Electrical Contractor	19
Required Identification at the Examination Site	4	LMC - Licensed Masonry Contractor	20
Security Procedures	4	Examination Registration Form	21
Taking the Examination by Computer	5	Order Form for Reference Material	23
Identification Screen	5	Special Arrangement Request Form	End of Bulletin
Tutorial	5		
Examination Question Example	5		
Examination Review	5		
Score Reporting	6		
Duplicate Score Reports	6		
Tips for Preparing for Your License Examination	6		
Description of Examinations	6		
Experimental Questions	6		

*CMC/CMC-A mechanical plumbing exam requires pre-approval!

Be sure to review this entire Candidate Information Bulletin for complete information about the scheduling, testing and licensing processes. Please refer to our website to check for the most updated information at www.psiexams.com.

EXAMINATIONS BY PSI

This Candidate Information Bulletin provides you with information about the examination and application process for a contractor licensee in the State of Tennessee.

Tennessee State Laws stipulate that a person may not act as a contractor without first obtaining a license issued by the Tennessee Board for Licensing Contractors.

The Tennessee Board for Licensing Contractors has contracted with PSI to conduct the examination program. PSI provides examinations through a network of computer examination centers in Tennessee. PSI works closely with the State to be certain that examinations meet local as well as national requirements in basic principles and examination development standards.

CONTACT INFORMATION

All questions and requests for information pertaining to the examination should be directed to PSI.

PSI
3210 E Tropicana
Las Vegas, NV 89121
(800) 733-9267 Fax (702) 932-2666
www.psiexams.com

All questions and requests for information pertaining to licensure should be directed to the Tennessee Board for Licensing Contractors.

Tennessee Board for Licensing Contractors
500 James Robertson Parkway
Nashville, TN 37243-1150
(615) 741-8307 or Fax (615) 532-2868
tn.gov/commerce/boards/contractors

EXAMINATION REGISTRATION PAYMENT AND SCHEDULING PROCEDURES

The Examination Registration Form is found at the end of this Candidate Information Bulletin. You must pay at the time you register. Be sure the registration form is complete, accurate, signed, and that you include the correct fee. The registration form is valid for 1 examination.

Examination fees can be found on the registration form at the end of this Candidate Information Bulletin.

NOTE: REGISTRATION FEES ARE NOT REFUNDABLE OR TRANSFERABLE

INTERNET REGISTRATION

The Examination Registration Form is available at PSI's website, www.psiexams.com. You may register for and schedule an examination via the Internet 24 hours a day.

1. Complete the registration form on line and send it to PSI via the Internet.

2. Upon completion of the online registration form, you will be given the available dates for scheduling your examination.

FAX REGISTRATION

For fax registration, you will need a valid credit card (Visa, MasterCard, American Express or Discover).

1. Complete the Examination Registration Form, including your credit card number and expiration date.
2. Fax the completed form to PSI (702) 932-2666. Fax registrations are accepted 24 hours a day.
3. Please allow 4 business days to process your registration. After 4 business days, you may call PSI to schedule the examination(s), (800) 733-9267.

STANDARD MAIL REGISTRATION

1. Complete the Examination Registration Form found in this Candidate Information Bulletin. BE SURE TO READ ALL DIRECTIONS CAREFULLY BEFORE COMPLETING THE EXAMINATION REGISTRATION FORM. IMPROPERLY COMPLETED FORMS WILL BE RETURNED TO YOU UNPROCESSED.
2. Return the completed original form to PSI with the appropriate examination fee. Payment of fees can be made by credit card (Visa, MasterCard, American Express or Discover), money order, company check or cashier's check. Make your money order or check payable to PSI and print your Social Security Number on it to ensure that your fees are properly assigned. **CASH AND PERSONAL CHECKS ARE NOT ACCEPTED.**
3. Please allow 2 weeks to process your registration before scheduling your examination.

TELEPHONE REGISTRATION

For telephone registration, you will need a valid credit card (Visa, MasterCard, American Express or Discover).

1. Complete the Examination Registration Form, including your credit card number and expiration date, so that you will be prepared with all of the information needed to register by telephone.
2. Call (800) 733-9267, 24 hours a day, to register using the Automated Registration System. Otherwise, PSI registrars are available Monday through Friday between 6:30 am and 9:00 pm, or Saturday-Sunday between 8:00 am and 4:30 pm, Central Time, to receive the information listed on your Examination Registration Form and to schedule your appointment for the examination.

SCHEDULING AN APPOINTMENT TO TAKE THE EXAMINATION

You are responsible for contacting PSI to schedule an appointment to take the examination. PSI will make every effort to schedule the examination site location and time that is most convenient for you. To schedule your examination using a touch-tone phone, call PSI 24 hours a day at (800) 733-9267. To schedule with a PSI registrar, call Monday through



Friday between 6:30 am and 9:00 pm, or Saturday-Sunday between 8:00 am and 4:30 pm, Central Time. If space is available in the examination site of your choice, you may schedule an examination 1 day prior to the examination date of your choice, up to 6:00 pm, Central Time. Please be prepared to offer alternate examination appointment choices.

REREGISTERING FOR AN EXAMINATION

It is not possible to make a new examination appointment on the same day you have taken an examination; this is due to processing and reporting scores. A candidate who tests unsuccessfully on a Monday can call the next day, Tuesday, and retest as soon as Wednesday, depending upon space availability. You may access a registration form at www.psiexams.com. You may also call PSI at (800) 733-9267. Please note that you may also use the automated system, using a touch-tone phone, 24 hours a day in order to register for an examination.

CANCELING AND RESCHEDULING AN EXAMINATION APPOINTMENT

You may cancel and reschedule an examination appointment without forfeiting your fee if your *cancellation notice is received 2 days before the scheduled examination date*. You may call PSI at (800) 733-9267 (a representative is available Monday through Friday between 6:30 am and 9:00 pm, and Saturday-Sunday between 8:00 am and 4:30 pm, Central Time). Please note that you may also use the automated system, using a touch-tone phone, 24 hours a day in order to cancel and reschedule your appointment.

Note: A voicemail message is not an acceptable form of cancellation. Please use the PSI website, automated telephone system, or call PSI and speak to a Customer Service Representative.

MISSED APPOINTMENT OR LATE CANCELLATION

Your registration will be invalid, you will not be able to take the examination as scheduled, and you will forfeit your examination fee, if you:

- Do not cancel your appointment 2 days before the scheduled examination date;
- Do not appear for your examination appointment;
- Arrive after examination start time; or
- Do not present proper identification when you arrive for the examination.

SPECIAL EXAMINATION ARRANGEMENTS

All examination centers are equipped to provide access in accordance with the Americans with Disabilities Act (ADA) of 1990, and every reasonable accommodation will be made in meeting a candidate's needs. Applicants with disabilities or those who would otherwise have difficulty taking the examination should make a request for alternative arrangements with PSI. Requests for special accommodations may be made filling out and submitting the Special Arrangement Request form found at the end of this bulletin.

EXAMINATION SITE CLOSING FOR AN EMERGENCY

In the event that severe weather or another emergency forces the closure of an examination site on a scheduled examination date, your examination will be rescheduled. PSI personnel will attempt to contact you in this situation. However, you may check the status of your examination schedule by calling (800) 733-9267. Every effort will be made to reschedule your examination at a convenient time as soon as possible.

SOCIAL SECURITY NUMBER CONFIDENTIALITY

PSI will use your Social Security Number only as an identification number in maintaining your records and reporting your examination scores to the state. A Federal law requires state agencies to collect and record the Social Security Numbers of all licensees of the professions licensed by the state. If you elect not to disclose your Social Security Number to PSI, please enclose a separate letter explaining this with your Examination Registration Form. However, you must provide it to the state.

EXAMINATION SITE LOCATIONS

The examinations are administered at the examination centers listed below:

Chattanooga

6918 Shallowford Rd, Suite 314
Chattanooga, TN 37421

Take I-24 thru Chattanooga. Merge onto I-75 N (toward Knoxville). Take Exit #5 - Shallowford Rd. Turn Left onto Shallowford. The office is on the left.

Jackson

368 North Parkway, #3
Jackson, TN 38305

From I-40, Exit 80A onto South 45 Bypass. Third Signal light is North Parkway. Go left onto North Parkway and then go right into the first driveway on your right.

From the South, take Bypass 45 North to North Parkway and go right onto North Parkway and right into first driveway on the right.

North Parkway is also known as Business Route 412. Coming from the east on 412, turn left into last driveway on the left. Coming from the West on North Parkway, turn right into the first driveway on the right, after crossing the 45 Bypass. PSI is directly across the street (North Parkway) from the China Palace Buffet.

Johnson City

904 Sunset Drive, Ste 7A
Johnson City, TN 37604

Take I-26 to Exit 19 (Old number 36). Go South on Highway 381 (North State of Franklin Road) approximately 2.2 miles. At the 4th light turn left (this is Sunset Drive), go approximately .7 tenths of a mile. There is a large building on the left hand side of the road. This is 904 Sunset Drive. Suite 7A is in the row of office spaces behind this building.

(Continued on the next page)



Knoxville
308 North Peters Rd, Ste 205
Knoxville, TN 37922

From East Knoxville

I-40 West (I-75 South) to exit #378 (Cedar Bluff). Take a left upon exiting (under freeway). Take a right on N Peters Rd at the second traffic light (Market Place). Take a right into Advantage Place (across from Microtel Hotel). Take first left into parking lot.

From West Knoxville (Farragut or anywhere west of Knoxville) I-40 East (I-75 North) to exit #378 (Cedar Bluff). Take a right onto Cedar Bluff Rd. Take a right on N Peters Rd at the first traffic light (Market Place). Take a right into Advantage Place (across from Microtel Hotel). Take first left into parking lot.

From North Knoxville

I-275 South to I-40 West I-40 West (I-75 South) to exit #378 (Cedar Bluff). Take a left upon exiting (under freeway). Take a right on N Peters Rd at the second traffic light (Market Place). Take a right into Advantage Place (across from Microtel Hotel). Take first left into parking lot.

From Kingston Pike

Head west on Kingston. Take a right at Cedar Bluff Rd. Take a left on N Peters Rd at the first traffic light (Market Place). Take a right into Advantage Place (across from Microtel Hotel). Take first left into parking lot.

Memphis
Apple Tree Center
6099 Mt. Moriah Extended, Suite 17
Memphis, TN 38115

Coming North from Mississippi on Interstate Hwy 55, take Interstate Hwy 240 East. Proceed 8.5 miles to Mt. Moriah Rd. Exit. Go South on Mt. Moriah Road 2.2 miles. Apple Tree Center is on the right (just past the intersection with Hickory Hill and Ridgeway roads).

Coming West on Interstate Hwy 40 from Nashville, exit on Interstate Hwy 240 West (the ring road). Proceed approx. 6.5 miles. Pass Poplar Ave. exit and then take Mt. Moriah Road Exit. Turn left (South) on Mt. Moriah and proceed 2.2 miles to Apple Tree Center on the right.

Coming East on Interstate Hwy 40, exit onto Interstate Hwy 240 South. Go approx. 6 miles to the junction with Interstate Hwy 55. Then proceed another 8.5 miles on Interstate Hwy 240 East, passing Airways Blvd., Lamar Ave., Getwell and Perkins Road exits, before exiting on Mt. Moriah Road.

For all going South on Mt. Moriah Rd., take the second entrance into Apple Tree Center. Turn left between the two buildings on the left. Then, proceed to Suite 17, which is the last suite on the left (in Bldg. 6099).

Nashville
The Oaks
1100 Kermit, Suite 103
Nashville, TN 37217

From I-40 East, take exit onto I-24 (Exit 213-A). Take Murfreesboro Road at the first exit (Exit 52). Stay in the right lane on the ramp, as the exit appears while you are still in the curve. On Murfreesboro, stay in the left lane. Turn left onto Kermit St when there is a McDonald's on your right. PSI is in the first building on your left.

From I-40 West, take exit onto Briley Parkway, turn left onto Briley. Exit onto Murfreesboro Rd. Stay in the right lane. Turn right onto Kermit St between a Firestone store and Silverado Dance Hall. Turn right onto Kermit St. PSI is in the first building on your left.

Additionally, PSI has examination centers in many other regions across the United States. You may take this examination at any of these locations by filling out the special accommodation form found at the end of this Candidate Information Bulletin.

REPORTING TO THE EXAMINATION SITE

On the day of the examination, you should arrive at least 30 minutes prior to your scheduled appointment time. This allows time for the sign-in and identification verification procedure as well as providing time for you to familiarize yourself with the examination process. *If you arrive late, you will not be admitted to the examination site and you will forfeit your examination registration fee.*

REQUIRED IDENTIFICATION AT EXAMINATION SITE

You must provide 2 forms of identification. One must be a VALID form of government-issued identification (driver's license, state ID, passport), which bears your signature and has your photograph or a complete physical description. The second ID must have your signature and preprinted legal name. All identification provided must match the name on the Examination Registration Form.

If you cannot provide the required identification, you must call (800) 733-9267 at least 3 weeks prior to your scheduled appointment to arrange a way to meet this security requirement. *Failure to provide all of the required identification at the time of the examination without notifying PSI is considered a missed appointment, and you will not be able to take the examination.*

SECURITY PROCEDURES

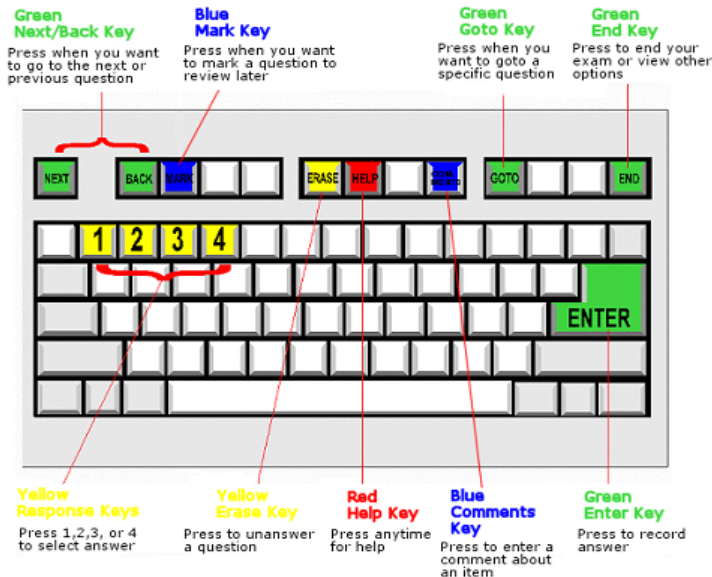
The following security procedures will apply during the examination:

- Cell phones, pagers, and children are not allowed in the examination site.
- Only non-programmable calculators that are silent, battery operated, do not have paper tape printing capabilities, and do not have a keyboard containing the alphabet will be allowed in the examination site.
- No smoking, eating, or drinking will be allowed in the examination site.
- Copying or communicating examination content is a violation of PSI security policy and Tennessee State Law. Either one may result in the disqualification of examination results and may lead to legal action.



TAKING THE EXAMINATION BY COMPUTER

Taking the PSI examination by computer is simple. You do not need any computer experience or typing skills. You will use fewer keys than you use on a touch-tone telephone. All response keys are colored and have prominent characters. An illustration of the special keyboard is shown here. You may also use the mouse.



IDENTIFICATION SCREEN

You will be directed to a semi-/private testing station to take the examination. When you are seated at the testing station, you will be prompted to confirm your name, identification number, and the examination for which you are registered.

TUTORIAL

Before you start your examination, an introductory tutorial to the computer and keyboard is provided on the computer screen. The time you spend on this tutorial, up to 15 minutes, DOES NOT count as part of your examination time. Sample questions are included following the tutorial so that you may practice using the keys, answering questions, and reviewing your answers.

One question appears on the screen at a time. During the examination, minutes remaining will be displayed at the top of the screen and updated as you record your answers.

EXAMINATION QUESTION EXAMPLE

During the examination, you should press 1, 2, 3, or 4 to select your answer or press "MARK" to mark it for later review. Or you may simply click on the box to the left of your answer with the mouse. You should then press "ENTER" to record your answer (or click on Next with the mouse) and move on to the next question. A sample question display follows:

The screenshot shows a computer interface for an examination. At the top, there is a navigation bar with icons for Mark, Comments, Goto, Help, and End. Below this, a status bar displays: Question: 3 of 40, Answered: 2, Unanswered: 1, Marked: 0, View: All, Time Left (Min): 359. The main area shows question 3: "What do the stars on the United States of America's flag represent?". Below the question, it says "(Choose from the following options)" and lists four options: 1. Presidents, 2. Colonies, 3. States, and 4. Wars. At the bottom, there are buttons for "<<Back" and "Next>>".

IMPORTANT: After you have entered your responses, you will later be able to return to any question(s) and change your response, provided the examination time has not run out or you have ended your examination.

EXAMINATION REVIEW

Failing candidates will have the option of reviewing their examination in a secure environment and challenging any questions or answers that they feel should be eliminated, or changed. The review is one hour in length.

The fee for reviewing your examination is \$50. You may register for the examination review via IVR, telephone, Internet, mail, or fax. If you would like to register by mail or fax, please fill out the Registration Form found on page 21 of this bulletin. You may pay with a credit card (Visa, MasterCard, American Express or Discover), money order, company check, or cashier's check. Cash and personal checks are not accepted.

During the review, candidates will be presented with the questions the candidate incorrectly answered during the examination. Additionally, the candidate will be given the correct answer to the question. The purpose of the review is to allow the candidate to self-research the question to determine why the answer they selected was incorrect. If the candidate feels that there is an error in the question, the candidate may comment about the question during the review by writing down comments on the Review sheet.

All comments made are for the future benefit of candidates. PSI will review all comments and, if necessary, make immediate key changes (or item deletions). However, PSI will not, under any circumstances, retroactively change a grade of any prior candidate. There will not be any notification sent to you from PSI with regard to your review.

You may not be permitted to take any notes out of the review sessions. Please call (800) 733-9267 with any questions. The examination review fee is \$50 and it is one hour in length, regardless of the number of portions you are reviewing. **You must schedule the examination review within 45 days from the date you originally took the examination.**

SCORE REPORTING

Your score will be given to you immediately following completion of the examination. The following summary describes the score reporting process:

- **On screen** - your score will appear immediately on the computer screen. This will happen automatically at the end of the time allowed for the examination; if you are using review features, you will be able to obtain your score immediately when you indicate that you have finished and would like to see your results.
 - If you **pass**, you will immediately receive a successful notification and performance summary on the screen.
 - If you **do not pass**, you will immediately receive an unsuccessful notification on the screen along with a diagnostic report indicating your strengths and weaknesses by examination portion. Registration forms for submittal to PSI to retake the examination will be available at the examination site.
- **On paper** - an official score report will be printed at the examination site.

DUPLICATE SCORE REPORTS

You may request a duplicate score report after your examination by emailing scorereport@psionline.com or by calling 800-733-9267.

TIPS FOR PREPARING FOR YOUR LICENSE EXAMINATION

The following suggestions will help you prepare for your examination.

- Planned preparation increases your likelihood of passing.
- Start with a current copy of this Candidate Information Bulletin and use the examination content outline as the basis of your study.
- Read study materials that cover all the topics in the content outline.
- Take notes on what you study. Putting information in writing helps you commit it to memory and it is also an excellent business practice. Underline or highlight key ideas that will help with a later review.
- Discuss new terms or concepts as frequently as you can with colleagues. This will test your understanding and reinforce ideas.
- Your studies will be most effective if you study frequently, for periods of about 45 to 60 minutes. Concentration tends to wander when you study for longer periods of time.

DESCRIPTION OF EXAMINATIONS

If a test question answer could differ because of conflicting information in test reference sources, a legal requirement such as a code, law, or regulation overrides any other reference. If two legal requirements appear to conflict, the state-specific code, law, or regulation overrides the national one. Information from sources on the test reference list override information from other sources or persons.

EXPERIMENTAL QUESTIONS

In addition to the number of questions per examination, a small number of five to ten "experimental" questions may be administered to candidates during the examinations. These questions will not be scored and the time taken to answer them will not count against examination time. The administration of such non-scored experimental questions is an essential step in developing future licensing examinations.

BUSINESS AND LAW MANAGEMENT EXAMINATION

# of Questions	% Required to Pass	Time Allowed
50	73% (37 items)	140 minutes

CONTENT OUTLINE

Subject Area	# of Items
Licensing Requirements	5
Estimating and Bidding	7
Business Organization and Financial Management	7
Tax Laws	5
Labor Laws	5
Project Management and Lien Law	6
Contracts	6
Risk Management	4
Environmental and Safety	5

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center.

This examination is OPEN BOOK.

The following reference material is allowed in the examination center:

- *Contractors' Guide to Business, Law and Project Management - Tennessee Edition, 2nd Edition, National Association of State Contractor Licensing Agencies (NASCLA), (623) 587-9519, Fax (623) 587-9625, www.nascla.org*

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in



the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

CONTENT OUTLINE

Subject Area	# of Items
General Knowledge and Math	14
General Requirements (not including Gas) - Administrative, Structural, Backflow, Materials and Supports, Joints and Connections, Storm Drains, Testing	10
Water Supply and Distribution	10
Fixtures, including Water Heaters	6
Drain, Waste, and Vent Systems, including Indirect and Special Waste	28
Traps, Cleanouts, and Interceptors	6
Isometric Analysis	20
Gas Appliances and Piping	12
OSHA Safety	4

CONTRACTOR EXAMINATIONS

The reference materials listed in the content outlines may be found at any of the following locations:

Builders Book Depot
www.buildersbookdepot.com
 800-284-3434

Construction Training Bookstore
 800-342-6315

Contractors Library
www.contractorslibrary.com
 877-542-3673

Many of these reference materials are available for purchase at www.psiolinestore.com or by calling the PSI Online Store, toll-free, at (866) 589-3088.

Titles currently in stock are listed on the order form near the end of this candidate information bulletin.

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Plumbing Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *International Fuel Gas Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *Mathematics for Plumbers and Pipefitters*, Lee Smith, 8th Edition, 2013, www.cengage.com
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1

OR

Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

CMC-A - MECHANICAL PLUMBING

IMPORTANT

Effective May 24, 2007, Senate Bill 0786 and HB 2122 requires plumbers to be pre-approved prior to taking CMCA (plumbing exam) and must show evidence of three (3) years experience. You must complete the "Exam Approval Request" form found on the Boards website: tn.gov/commerce/boards/contractors, and send to the Board office. Upon receipt, after the experience is confirmed, your information will be electronically submitted to PSI, and you can then schedule for the examination.

# of Questions	% Required to Pass	Time Allowed
110	73% (81 items)	290 minutes

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to



bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

**BC - COMBINED -
RESIDENTIAL/COMMERCIAL/INDUSTRIAL
CONTRACTOR**

# of Questions	% Required to Pass	Time Allowed
100	73% (73 items)	300 minutes

CONTENT OUTLINE

Subject Area	# of Items
Sitework, Footings, and Foundation	10
Concrete and Concrete Reinforcement	15
Masonry	10
Carpentry	6
Metals	10
Roofing	6
Associated Trades	10
General Code, Plan Reading, and Estimating	27
OSHA Safety	6

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center. Candidates may also use a construction calculator.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Building Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1

OR

Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

- *Carpentry and Building Construction*, 2010 edition, John L. Feirer and Mark D. Feirer, Publisher: McGraw-Hill, www.contractorsseminars.com, 828-277-3999.
- *Roofing Construction and Estimating*, Daniel Atcheson, 1995, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products
- *Modern Masonry - Brick, Block, Stone*, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com
- *Pipe and Excavation Contracting*, Dave Roberts, 2011, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products
- *Gypsum Construction Handbook*, 7th edition, 2014, United States Gypsum Company (USG), RS Means Publishing, 700 Longwater Drive, Norwell, MA 02061, 800-334-3509, Fax: 800-632-6732, <http://rsmeans.reedconstructiondata.com>
- *Technical Digest No. 9 - Handling and Erection of Steel Joists and Joist Girders*, 3rd Edition, 2008, Steel Joint Institute, 234 W. Cheves Street, Florence, SC 29501, Phone: (843) 407-4091, Fax (843) 407-4044, www.steeljoist.org
- *SDI Manual of Construction with Steel Deck*, 2006, 2nd Edition, Steel Deck Institute, (847) 458-4647, <http://www.sdi.org/manuals.htm>
- *Placing Reinforcing Bars*, 2011, 9th Edition, Concrete Reinforcing Steel Institute, (800) 328-6306, www.crsi.org
- *Design and Control of Concrete Mixtures*, Steven H. Kosmatka and William C. Panarese, 15th Edition, 2011, Portland Cement Association, (847) 966-6200, www.cement.org
- *Training and Certification of Field Personnel for Unbonded Post-Tensioning - Level 1 Field Fundamentals*, 2003, 3rd Edition, Post-Tensioning Institute, (602) 870-7540, <http://post-tensioning.org/index.php>
- *Erectors' Manual - Standards and Guidelines for the Erection of PreCast Concrete Products*, 1999, 2nd Edition, Precast/Prestressed Concrete Institute (PCI), (312) 786-0300, www.pci.org
- *International Residential Code for One- and Two-Family Dwellings*, 2009, International Code Council, (800) 786-4452, www.iccsafe.org
- *ACI 530-05 or 08 Building Code Requirements for Masonry Structures*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org
- *ACI 318-05 or 08 Building Code Requirements for Structural Concrete and Commentary*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org



Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

The following reference materials are allowed in the examination center:

- *International Residential Code for One- and Two-Family Dwellings*, 2009, International Code Council, (800) 786-4452, www.iccsafe.org
 - *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1
- OR
- *Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI*, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)
 - *Carpentry and Building Construction*, 2010 edition, John L. Feirer and Mark D. Feirer, Publisher: McGraw-Hill, www.contractorsseminars.com, 828-277-3999.
 - *BCSI: Guide to Good Practice for Handling, Installing, Restraining, and Bracing of Metal Plate Connected Wood Trusses*, 2013, Structural Building Components Association and Truss Plate Institute, (608) 274-4849, www.sbcindustry.com
 - *The Contractor's Guide to Quality Concrete Construction*, 2005, 3rd Edition, American Concrete Institute, (248) 848-3700, www.aci-int.org
 - *Roofing Construction and Estimating*, Daniel Atcheson, 1995, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products
 - *Modern Masonry - Brick, Block, Stone*, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com
 - *Pipe and Excavation Contracting*, Dave Roberts, 2011, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products

BC-A - RESIDENTIAL CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
100	73% (73 items)	300 minutes

CONTENT OUTLINE

Subject Area	# of Items
Sitework, Footings, and Foundation	10
Concrete and Concrete Reinforcement	10
Masonry	7
Carpentry	20
Roofing	10
Estimating, Plan Reading, and Gen Residential Code Requirements	20
Associated Trades	15
OSHA Safety	8

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center. Candidates may also use a construction calculator.

This examination is OPEN BOOK.

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

BC-B - COMMERCIAL CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
100	73% (73 items)	300 minutes

CONTENT OUTLINE

Subject Area	# of Items
Sitework, Footings, and Foundation	10
Concrete and Concrete Reinforcement	15
Masonry	10
Metals	10
Carpentry	6
OSHA Safety	6
General Code, Plan Reading, and Estimating	27
Associated Trades	10
Roofing	6

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based only on the edition of the Code book that is listed.**

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center. Candidates may also use a construction calculator.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Building Code, 2006, International Code Council, (800) 786-4452, www.iccsafe.org*
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA), with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1*
OR
Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)
- *Roofing Construction and Estimating, Daniel Atcheson, 1995, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products*
- *Modern Masonry - Brick, Block, Stone, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com*

- *Pipe and Excavation Contracting, Dave Roberts, 2011, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products*
- *Gypsum Construction Handbook, 7th edition, 2014, United States Gypsum Company (USG), RS Means Publishing, 700 Longwater Drive, Norwell, MA 02061, 800-334-3509, Fax: 800-632-6732, <http://rsmeans.reedconstructiondata.com>*
- *Technical Digest No. 9 - Handling and Erection of Steel Joists and Joist Girders, 3rd Edition, 2008, Steel Joint Institute, 234 W. Cheves Street, Florence, SC 29501, Phone: (843) 407-4091, Fax (843) 407-4044, www.steeljoist.org*
- *SDI Manual of Construction with Steel Deck, 2006, 2nd Edition, Steel Deck Institute, (847) 458-4647, <http://www.sdi.org/manuals.htm>*
- *Placing Reinforcing Bars, 2011, 9th Edition, Concrete Reinforcing Steel Institute, (800) 328-6306, www.crsi.org*
- *Design and Control of Concrete Mixtures, Steven H. Kosmatka and William C. Panarese, 15th Edition, 2011, Portland Cement Association, (847) 966-6200, www.cement.org*
- *Training and Certification of Field Personnel for Unbonded Post-Tensioning - Level 1 Field Fundamentals, 2003, 3rd Edition, Post-Tensioning Institute, (602) 870-7540, <http://post-tensioning.org/index.php>*
- *Erectors' Manual - Standards and Guidelines for the Erection of PreCast Concrete Products, 1999, 2nd Edition, Precast/Prestressed Concrete Institute (PCI), (312) 786-0300, www.pci.org*
- *ACI 530-05 or 08 Building Code Requirements for Masonry Structures, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org*
- *ACI 318-05 or 08 Building Code Requirements for Structural Concrete and Commentary, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org*

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

BC-b - SMALL COMMERCIAL CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
70	73% (52 items)	200 minutes

CONTENT OUTLINE

Subject Area	# of Items
Sitework, Footings, and Foundation	6
Concrete and Concrete Reinforcement	8
Masonry	6
Metals	12
Carpentry	6
Roofing	7
Associated Construction Trades	5
OSHA Safety	5
General Code, Plan Reading, and Estimating	15

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center. Candidates may also use a construction calculator.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Building Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *The Contractor's Guide to Quality Concrete Construction*, 2005, 3rd Edition, American Concrete Institute, (248) 848-3700, www.aci-int.org
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1
OR
Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

- *BCSI: Guide to Good Practice for Handling, Installing, Restraining, and Bracing of Metal Plate Connected Wood Trusses*, 2013, Structural Building Components Association and Truss Plate Institute, (608) 274-4849, www.sbcindustry.com
- *Roofing Construction and Estimating*, Daniel Atcheson, 1995, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products
- *Modern Masonry - Brick, Block, Stone*, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com
- *Pipe and Excavation Contracting*, Dave Roberts, 2011, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products
- *Gypsum Construction Handbook*, 7th edition, 2014, United States Gypsum Company (USG), RS Means Publishing, 700 Longwater Drive, Norwell, MA 02061, 800-334-3509, Fax: 800-632-6732, rsmeans.reedconstructiondata.com
- *Technical Digest No. 9 - Handling and Erection of Steel Joists and Joist Girders*, 3rd Edition, 2008, Steel Joint Institute, 234 W. Cheves Street, Florence, SC 29501, Phone: (843) 407-4091, Fax (843) 407-4044, www.steeljoist.org
- *SDI Manual of Construction with Steel Deck*, 2006, 2nd Edition, Steel Deck Institute, (847) 458-4647, <http://www.sdi.org/manuals.htm>
- *Carpentry and Building Construction*, 2010 edition, John L. Feirer and Mark D. Feirer, Publisher: McGraw-Hill, www.contractorsseminars.com, 828-277-3999.
- *ACI 530-05 or 08 Building Code Requirements for Masonry Structures*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org
- *ACI 318-05 or 08 Building Code Requirements for Structural Concrete and Commentary*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

BC-C - INDUSTRIAL CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
72	73% (53 items)	210 minutes

CONTENT OUTLINE

Subject Area	# of Items
Sitework, Footings, and Foundation	5
Concrete and Concrete Reinforcement	18
Masonry	6
Carpentry	4
Metals	13
Roofing	4
Associated Trades	4
OSHA Safety	5
General Code, Plan Reading, and Estimating	13

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center. Candidates may also use a construction calculator.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Building Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1

OR

Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

- *Modern Masonry - Brick, Block, Stone*, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com

- *Pipe and Excavation Contracting*, Dave Roberts, 2011, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products
- *Technical Digest No. 9 - Handling and Erection of Steel Joists and Joist Girders*, 3rd Edition, 2008, Steel Joint Institute, 234 W. Cheves Street, Florence, SC 29501, Phone: (843) 407-4091, Fax (843) 407-4044, www.steeljoist.org.
- *SDI Manual of Construction with Steel Deck*, 2006, 2nd Edition, Steel Deck Institute, (847) 458-4647, <http://www.sdi.org/manuals.htm>
- *Training and Certification of Field Personnel for Unbonded Post-Tensioning - Level 1 Field Fundamentals*, 2003, 3rd Edition, Post-Tensioning Institute, (602) 870-7540, <http://post-tensioning.org/index.php>
- *Erectors' Manual - Standards and Guidelines for the Erection of PreCast Concrete Products*, 1999, 2nd Edition, Precast/Prestressed Concrete Institute (PCI), (312) 786-0300, www.pci.org
- *Placing Reinforcing Bars*, 2011, 9th Edition, Concrete Reinforcing Steel Institute, (800) 328-6306, www.crsi.org
- *Design and Control of Concrete Mixtures*, Steven H. Kosmatka and William C. Panarese, 15th Edition, 2011, Portland Cement Association, (847) 966-6200, www.cement.org
- *Carpentry and Building Construction*, 2010 edition, John L. Feirer and Mark D. Feirer, Publisher: McGraw-Hill, www.contractorsseminars.com, 828-277-3999.
- *ACI 530-05 or 08 Building Code Requirements for Masonry Structures*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org
- *ACI 318-05 or 08 Building Code Requirements for Structural Concrete and Commentary*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

**BC-A, B - COMBINED -
RESIDENTIAL/COMMERCIAL CONTRACTOR**

# of Questions	% Required to Pass	Time Allowed
100	73% (73 items)	270 minutes

CONTENT OUTLINE

Subject Area	# of Items
Sitework, Footings, and Foundation	10
Concrete and Concrete Reinforcement	15
Masonry	10
Carpentry	6
Metals	10
Roofing	6
Associated Trades	10
General Code, Plan Reading, and Estimating	27
OSHA Safety	6

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center. Candidates may also use a construction calculator.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Building Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *International Residential Code for One- and Two-Family Dwellings*, 2009, International Code Council, (800) 786-4452, www.iccsafe.org
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1 -OR- *Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI*, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)
- *Carpentry and Building Construction*, 2010 edition, John L. Feirer and Mark D. Feirer, Publisher: McGraw-Hill, www.contractorsseminars.com, 828-277-3999.
- *Roofing Construction and Estimating*, Daniel Acheson, 1995, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products

- *Modern Masonry - Brick, Block, Stone*, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com
- *Pipe and Excavation Contracting*, Dave Roberts, 2011, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products
- *Gypsum Construction Handbook*, 7th edition, 2014, United States Gypsum Company (USG), RS Means Publishing, 700 Longwater Drive, Norwell, MA 02061, 800-334-3509, Fax: 800-632-6732, rsmeans.reedconstructiondata.com
- *Technical Digest No. 9 - Handling and Erection of Steel Joists and Joist Girders*, 3rd Edition, 2008, Steel Joint Institute, 234 W. Cheves Street, Florence, SC 29501, Phone: (843) 407-4091, Fax (843) 407-4044, www.steeljoist.org.
- *SDI Manual of Construction with Steel Deck*, 2006, 2nd Edition, Steel Deck Institute, (847) 458-4647, <http://www.sdi.org/manuals.htm>
- *Placing Reinforcing Bars*, 2011, 9th Edition, Concrete Reinforcing Steel Institute, (800) 328-6306, www.crsi.org
- *Design and Control of Concrete Mixtures*, Steven H. Kosmatka and William C. Panarese, 15th Edition, 2011, Portland Cement Association, (847) 966-6200, www.cement.org
- *Training and Certification of Field Personnel for Unbonded Post-Tensioning - Level 1 Field Fundamentals*, 2003, 3rd Edition, Post-Tensioning Institute, (602) 870-7540, <http://post-tensioning.org/index.php>
- *Erectors' Manual - Standards and Guidelines for the Erection of PreCast Concrete Products*, 1999, 2nd Edition, Precast/Prestressed Concrete Institute (PCI), (312) 786-0300, www.pci.org
- *ACI 530-05 or 08 Building Code Requirements for Masonry Structures*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org
- *ACI 318-05 or 08 Building Code Requirements for Structural Concrete and Commentary*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).



**BC-A, b (sm) - COMBINED-
RESIDENTIAL/SMALL COMMERCIAL
CONTRACTOR**

# of Questions	% Required to Pass	Time Allowed
100	73% (73 items)	300 minutes

CONTENT OUTLINE

Subject Area	# of Items
Sitework, Footings, and Foundation	10
Concrete and Concrete Reinforcement	10
Metals	6
Masonry	7
Carpentry	17
Roofing	10
Estimating, Plan Reading, and Gen Residential Code Requirements	20
Associated Trades	12
OSHA Safety	8

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based only on the edition of the Code book that is listed.**

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center. Candidates may also use a construction calculator.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Building Code, 2006, International Code Council, (800) 786-4452, www.iccsafe.org*
- *International Residential Code for One- and Two-Family Dwellings, 2009, International Code Council, (800) 786-4452, www.iccsafe.org*
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA), with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1*

OR

Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

- *Carpentry and Building Construction, 2010 edition, John L. Feirer and Mark D. Feirer, Publisher: McGraw-Hill, www.contractorsseminars.com, 828-277-3999.*
- *BCSI: Guide to Good Practice for Handling, Installing, Restraining, and Bracing of Metal Plate Connected Wood Trusses, 2013, Structural Building Components Association and Truss Plate Institute, (608) 274-4849, www.sbcindustry.com*
- *The Contractor's Guide to Quality Concrete Construction, 2005, 3rd Edition, American Concrete Institute, (248) 848-3700, www.aci-int.org*
- *Roofing Construction and Estimating, Daniel Atcheson, 1995, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products*
- *Modern Masonry - Brick, Block, Stone, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com*
- *Pipe and Excavation Contracting, Dave Roberts, 2011, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products*
- *Gypsum Construction Handbook, 7th edition, 2014, United States Gypsum Company (USG), RS Means Publishing, 700 Longwater Drive, Norwell, MA 02061, 800-334-3509, Fax: 800-632-6732, rsmmeans.reedconstructiondata.com*
- *Technical Digest No. 9 - Handling and Erection of Steel Joists and Joist Girders, 3rd Edition, 2008, Steel Joint Institute, 234 W. Cheves Street, Florence, SC 29501, Phone: (843) 407-4091, Fax (843) 407-4044, www.steeljoist.org.*
- *SDI Manual of Construction with Steel Deck, 2006, 2nd Edition, Steel Deck Institute, (847) 458-4647, <http://www.sdi.org/manuals.htm>*
- *ACI 530-05 or 08 Building Code Requirements for Masonry Structures, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org*
- *ACI 318-05 or 08 Building Code Requirements for Structural Concrete and Commentary, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org*

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).



**BC-B, C - COMBINED -
COMMERCIAL/INDUSTRIAL CONTRACTOR**

# of Questions	% Required to Pass	Time Allowed
100	73% (73 items)	300 minutes

CONTENT OUTLINE

Subject Area	# of Items
Sitework, Footings, and Foundation	10
Concrete and Concrete Reinforcement	15
Metals	10
Masonry	10
Carpentry	6
OSHA Safety	6
General Code, Plan Reading, and Estimating	27
Associated Trades	10
Roofing	6

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center. Candidates may also use a construction calculator.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Building Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1
OR
Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)
- *Roofing Construction and Estimating*, Daniel Atcheson, 1995, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products

- *Modern Masonry - Brick, Block, Stone*, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com
- *Pipe and Excavation Contracting*, Dave Roberts, 2011, Craftsman Book Company, (800) 829-8123, www.craftsman-book.com/products
- *Gypsum Construction Handbook*, 7th edition, 2014, United States Gypsum Company (USG), RS Means Publishing, 700 Longwater Drive, Norwell, MA 02061, 800-334-3509, Fax: 800-632-6732, rsmeans.reedconstructiondata.com
- *Technical Digest No. 9 - Handling and Erection of Steel Joists and Joist Girders*, 3rd Edition, 2008, Steel Joint Institute, 234 W. Cheves Street, Florence, SC 29501, Phone: (843) 407-4091, Fax (843) 407-4044, www.steeljoist.org.
- *SDI Manual of Construction with Steel Deck*, 2006, 2nd Edition, Steel Deck Institute, (847) 458-4647, <http://www.sdi.org/manuals.htm>
- *Placing Reinforcing Bars*, 2011, 9th Edition, Concrete Reinforcing Steel Institute, (800) 328-6306, www.crsi.org
- *Design and Control of Concrete Mixtures*, Steven H. Kosmatka and William C. Panarese, 15th Edition, 2011, Portland Cement Association, (847) 966-6200, www.cement.org
- *Training and Certification of Field Personnel for Unbonded Post-Tensioning - Level 1 Field Fundamentals*, 2003, 3rd Edition, Post-Tensioning Institute, (602) 870-7540, <http://post-tensioning.org/index.php>
- *Erectors' Manual - Standards and Guidelines for the Erection of PreCast Concrete Products*, 1999, 2nd Edition, Precast/Prestressed Concrete Institute (PCI), (312) 786-0300, www.pci.org
- *ACI 530-05 or 08 Building Code Requirements for Masonry Structures*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org
- *ACI 318-05 or 08 Building Code Requirements for Structural Concrete and Commentary*, 2005 or 2008, American Concrete Institute, (248) 848-3700, www.concrete.org

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

CE - ELECTRICAL CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
100	73% (73 items)	260 minutes

CONTENT OUTLINE

Subject Area	# of Items
General Knowledge and Electrical Installation Requirements	14
Building Code Requirements	5
Services, Feeders, and Branch Circuits	10
Overcurrent Protection	4
Grounding and Bonding	10
Conductors and Cables	8
Raceways and Boxes	8
Hazardous Locations, Special Occupancies, and Special Equipment	12
Low Voltage, Alarms, Signaling Systems, and Communications	7
Lighting, Signs and General Use Equipment	6
OSHA and NFPA 70E Safety	6
Motors, Transformers, and Generators	10

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *NFPA 70 - National Electrical Code*, 2008, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *National Electrical Code (NEC) Handbook*, 2008, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1
OR
Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

- *NFPA 70E - Standard for Electrical Safety in the Workplace*, 2004, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 70E - Handbook for Electrical Safety in the Workplace*, 2004 Edition, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *International Building Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org

*The following reference material is **NOT** allowed in the examination center:*

- *Ugly's Electrical References*, George V. Hart, 2008 or 2011, Jones and Bartlett, (800) 832-0034, www.uglys.net.

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

*CMC - FULL MECHANICAL CONTRACTOR

IMPORTANT

Effective May 24, 2007, Senate Bill 0786 and HB 2122 requires plumbers to be pre-approved prior to taking CMC (plumbing exam) and must show evidence of three (3) years experience. You must complete the "Exam Approval Request" form found on the Boards website: tn.gov/commerce/boards/contractors, and send to the Board office. Upon receipt, after the experience is confirmed, your information will be electronically submitted to PSI, and you can then schedule for the examination.

# of Questions	% Required to Pass	Time Allowed
120	73% (88 items)	310 minutes

CONTENT OUTLINE

Subject Area	# of Items
Electrical Knowledge, Motors, and Controls	8
Piping - Refrigeration, Hydronic, Steam, and Process	10
Heating and Cooling Principles and Theory	5

Heating and Cooling Equipment and Components	10
Refrigerants and Refrigeration	10
Fuel and LP Gas	10
Combustion Air, Chimneys, Flues, and Vents	10
Ducts, Ventilation, and Exhaust	10
Plumbing	20
Load Calculation	5
Safety, Fire and Smoke Protection	12
Fire Sprinkler	10

www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1

OR

Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

- *Manual N - Commercial Load Calculation for Small Commercial Buildings*, 5th Edition, 2008, Air Conditioning Contractors of America (ACCA), (703) 575-4477, www.acca.org
- *NFPA 13 - Installation of Sprinkler Systems*, 2002, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *Manual J - Residential Load Calcs*, reprinted 2006, Eighth Full Edition, Air Conditioning Contractors of America (ACCA), 2800 Shirlington Road, Suite 300, Arlington, VA 22206, (703) 575-4477, www.acca.org

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. Except for Code books, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based only on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Mechanical Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *International Fuel Gas Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *Pipefitters Handbook*, Forrest R. Lindsey, 1967, 3rd Edition, Industrial Press, (888) 528-7852, www.industrialpress.com
- *International Plumbing Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *Modern Refrigeration and Air Conditioning*, 2004, 18th Edition, The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com
- An air duct sizing calculator wheel, slide, or similar device
- *HVAC Duct Construction Standards, Metal and Flexible*, 2005, 3rd edition, Sheet Metal and Air Conditioning Contractors' National Association, Inc., (703) 803-2980, www.smacna.org
- *Ugly's Electrical References*, George V. Hart, 2008 or 2011, Jones and Bartlett, (800) 832-0034, www.uglys.net. All items are based on either the 2008 or 2011 editions
- *Carrier System Design Manual Part 3 - Piping Design*, Carrier Air Conditioning Company, (800) 227-7437, www.training.carrier.com
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

CMC-C - MECHANICAL - HVAC/REFRIGERATION CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
100	73% (73 items)	240 minutes

CONTENT OUTLINE

Subject Area	# of Items
Electrical Knowledge, Motors, and Controls	7
Piping - Refrigeration, Hydronic, Steam and Process	14
Heating and Cooling Principles and Theory	10
Heating and Cooling Equipment and Components	10
Refrigerants and Refrigeration	10
Fuel and LP Gas	10
Combustion Air, Chimneys, Flues and Vents	10
Ducts, Ventilation and Exhaust	14

Load Calculation	5
Safety, Fire and Smoke Protection	10

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *International Mechanical Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *Manual J - Residential Load Calcs*, reprinted 2006, Eighth Full Edition, Air Conditioning Contractors of America (ACCA), 2800 Shirlington Road, Suite 300, Arlington, VA 22206, (703) 575-4477, www.acca.org
- *International Fuel Gas Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *Pipefitters Handbook*, Forrest R. Lindsey, 1967, 3rd Edition, Industrial Press, (888) 528-7852, www.industrialpress.com
- *Modern Refrigeration and Air Conditioning*, 2004, 18th Edition, The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com
- An air duct sizing calculator wheel, slide or similar device
- *HVAC Duct Construction Standards, Metal and Flexible*, 2005, 3rd edition, Sheet Metal and Air Conditioning Contractors' National Association, Inc., (703) 803-2980, www.smacna.org
- *Ugly's Electrical References*, George V. Hart, 2008 or 2011, Jones and Bartlett, (800) 832-0034, www.uglys.net. All items are based on either the 2008 or 2011 editions
- *Carrier System Design Manual Part 3 - Piping Design*, Carrier Air Conditioning Company, (800) 227-7437, www.training.carrier.com
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1
OR
Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

CMC-D - MECHANICAL - FIRE SPRINKLERS AND FIRE PROTECTION CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
77	73% (57 items)	180 minutes

CONTENT OUTLINE

Subject Area	# of Items
Miscellaneous Systems	10
NFPA 13-D	4
NFPA 13-R	6
NFPA 13	30
NFPA 14	5
NFPA 20	7
NFPA 24	5
NFPA 25	6
NFPA 101	4

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *NFPA 11 - Standard for Low-, Medium-, and High-Expansion Foam*, 2005, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org

- *NFPA 12 - Standard on Carbon Dioxide Extinguishing Systems*, 2008, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 15 - Standard for Water Spray Fixed Systems for Fire Protection*, 2007, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 16 - Standard for the Installation of Foam-Water Sprinkler and Foam-Water Spray Systems*, 2003, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 22 - Standard for Water Tanks for Private Fire Protection*, 2003, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 2001 - Standard for Clean Agent Fire Extinguishing Systems*, 2008, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 13D - Standard for the Installation of Sprinkler Systems in One- and Two-Family Dwellings and Manufactured Homes*, 2002, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 13R - Standard for the Installation of Sprinkler Systems in Residential Occupancies up to and Including Four Stories in Height*, 2002, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 13 - Installation of Sprinkler Systems*, 2002, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 14 - Installation of Standpipe, Private Hydrant, and Hose Systems*, 2003, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 20 - Standard for the Installation of Stationary Pumps for Fire Protection*, 2007, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 24 - Standard for the Installation of Private Fire Service Mains and Their Appurtenances*, 2007, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 25 - Inspection, Testing and Maintenance of Water-Based Fire Protection Systems*, 2008, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org
- *NFPA 101 - Life Safety Code*, 2006, National Fire Protection Association (NFPA), (800) 344-3555, www.nfpa.org

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations.

Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

CE-A, H - HIGH VOLTAGE ELECTRICAL CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
60	73% (44 items)	160 minutes

CONTENT OUTLINE

Subject Area	# of Items
Safety	10
Tools, Equipment, and Transportation	10
Structures	5
Transformers, Breakers, Vaults	5
Conductors	4
Distribution, Transmission, and Substations	16
General Electrical Knowledge	10

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:

- *NFPA 70 - National Electrical Code*, 2008, National Fire Protection Association, (800) 344-3555, www.nfpa.org
- *National Electrical Code, NEC Handbook*, 2008, National Fire Protection Association, (800) 344-3555, www.nfpa.org
- *National Electrical Safety Code*, 2002, Institute of Electrical and Electronics Engineers, Inc., (732) 981-1721, www.ieee.org
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800, www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1 -OR- *Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI*, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)
- *Ugly's Electrical References*, George V. Hart, 2008 or 2011, Jones and Bartlett, (800) 832-0034, www.uglys.net. All items are based on either the 2008 or 2011 editions

- *American Electricians' Handbook*, Croft, Hartwell, and Summers, 16th Edition, 2013, McGraw-Hill, (800) 262-4729, shop.mcgraw-hill.com
- *Lineman's and Cableman's Handbook*, Shoemaker and Mack, 12th Edition, 2011, McGraw Hill, (800) 262-4729, shop.mcgraw-hill.com

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

- *International Building Code*, 2006, International Code Council, (800) 786-4452, www.iccsafe.org
- *ACI-530-08: Building Code Requirements and Specification for Masonry Structures and Related Commentaries*, 2008, American Concrete Institute/American Society of Civil Engineers, <http://www.concrete.org/general/home.asp>,
- *Modern Masonry - Brick, Block, Stone*, Clois E. Kicklighter, 2010 (Seventh Edition), The Goodheart-Willcox Company, (800) 323-0440, www.goodheartwillcox.com
- *Code of Federal Regulations - 29 CFR Part 1926 (OSHA)*, with latest available amendments, U.S. Government Printing Office, (866) 512-1800 or www.access.gpo.gov/nara/cfr/cfr-table-search.html#page1

OR

Code of Federal Regulations - 29 CFR Part 1926 Selections by PSI, with latest available amendments, 3210 E Tropicana, Las Vegas, NV 89121, (800) 733-9267, www.psiexams.com (See order form at the end of the Candidate Information Bulletin.)

- *ASTM Masonry Standards for the Building Industry*, 2008, 6th edition, ASTM International, www.astm.org
- *Indiana Limestone Handbook*, 22nd edition, 2010, Indiana Limestone Institute of America, Bedford, IN 47421, <http://www.iliai.com/index.php?pagelid=41>
- *Repointing Mortar Joints in Historic Masonry Buildings*, Robert C. Mack, and John P. Speweik, October 1998, Technical Preservation Services, National Parks Service, U.S. Department of the Interior, 2 Preservation Briefs, <http://www.nps.gov/hps/tps/briefs/brief02.htm>
- *Cleaning Brickwork*, June 2006, BIA Technical Notes on Brick Construction, Vol. 20, The Brick Industry Association, 1850 Centennial Park Drive, Reston, VA 20191, http://www.gobrick.com/html/frmset_thnt.htm

Candidates are responsible for bringing their own references to the examination center. Reference materials may be highlighted, underlined, and/or indexed prior to the examination session. However, references may not be written in. Any candidate caught writing in the references during the examination will be reported to the Board. Furthermore, candidates are not permitted to bring in any additional papers (loose or attached) with their approved references. References may be tabbed/indexed with permanent tabs only. Temporary tabs, such as Post-It notes, are not allowed and must be removed from the reference before the exam will begin. Scratch paper will be provided for calculations. Candidates will NOT be permitted to remove from the examination room ANY material that has been written on. (This would include books).

LMC - LICENSED MASONRY CONTRACTOR

# of Questions	% Required to Pass	Time Allowed
70	73% (51 items)	200 minutes

CONTENT OUTLINE

Subject Area	# of Items
Estimating and Plan Reading	7
Unit Masonry	10
Mortar and Grout	10
Accessories and Specialties	10
Stone	5
Tools	4
Restoration and Cleaning	4
Reinforced Masonry	6
Quality Assurance	6
Safety	8

REFERENCE LIST

The reference material listed below was used to prepare the questions for this examination. The examination may also contain questions based on trade knowledge or general industry practices. **Except for Code books**, you can base your answers on later editions of references as they become available. For Code questions, the examinations will be based **only** on the edition of the Code book that is listed.

Candidates may use a silent, nonprinting, non-programmable calculator in the examination center.

This examination is OPEN BOOK.

The following reference materials are allowed in the examination center:



CE-A, H - HIGH VOLTAGE ELECTRICAL CONTRACTOR <input type="checkbox"/> Trade Portion <input type="checkbox"/> Business & Law	\$55 \$55
*CMC - FULL MECHANICAL CONTRACTOR <input type="checkbox"/> Trade Portion *Must have pre-approval; see page 15) <input type="checkbox"/> Business & Law	\$55 \$55
*CMC-A - MECHANICAL PLUMBING CONTRACTOR <input type="checkbox"/> Trade Portion (*Must have pre-approval; see page 7) <input type="checkbox"/> Business & Law	\$55 \$55
CMC-C - MECHANICAL - HVAC/REFRIGERATION CONTRACTOR <input type="checkbox"/> Trade Portion <input type="checkbox"/> Business & Law	\$55 \$55
CMC-D - MECHANICAL - FIRE SPRINKLERS AND FIRE PROTECTION CONTRACTOR <input type="checkbox"/> Trade Portion <input type="checkbox"/> Business & Law	\$55 \$55
LMC - LICENSED MASONRY CONTRACTOR <input type="checkbox"/> Trade Portion <input type="checkbox"/> Business & Law	\$55 \$55
<input type="checkbox"/> EXAMINATION REVIEW (Fee for an Exam Review session is \$50, regardless of how many exams are reviewed.)	\$50

8. **Total Fee Included:** \$_____. You may pay by credit card, company check, cashier's check or money order. Make your check or money order payable to PSI and note your Social Security # on it.

If paying by credit card, check one: VISA MasterCard American Express Discover

Card Number: _____ Exp. Date: _____

Card Verification No: _____ *The card verification number may be located on the back of the card (the last three digits on the signature strip) or on the front of the card (the four digits to the right and above the card account number).*

Billing Street Address: _____ Billing Zip Code: _____

Cardholder Name (Print): _____ Signature: _____

9. I am faxing the Special Arrangement Request (at the end of this bulletin) and required documentation. Yes No

10. **Affidavit:** I certify that the information provided on this registration form (and/or telephonically to PSI) is correct. I understand that any falsification of information may result in denial of licensure. I have read and understand the examination information bulletin.

Signature: _____ Date: _____

IF YOU ARE REGISTERING BY MAIL OR FAX, SIGN AND DATE THIS REGISTRATION FORM ON THE LINES PROVIDED.

Complete and forward this registration form with the applicable examination fee to:
PSI * ATTN: Examination Registration TN CO
3210 E Tropicana * Las Vegas * NV * 89121
Fax (702) 932-2666 * (800) 733-9267 * TTY (800) 735-2929 * www.psiexams.com

PSI may occasionally share your information with partners who have offers of interest to you. Please check this box if you do not wish PSI to share your information with these parties. Please note: PSI will never release your ID number or SSN number.

BOOKS AND MORE ARE NOW AVAILABLE AT THE PSI ONLINE STORE!

To place an order for one or more of the following items listed, you may:

- Order online at www.pSIONlinestore.com
- Call the PSI Online store toll-free at (866) 589-3088

Note: prices are available online at www.pSIONlinestore.com

<input type="checkbox"/>	International Mechanical Code
<input type="checkbox"/>	International Building Code
<input type="checkbox"/>	International Plumbing Code
<input type="checkbox"/>	29 CFR Part 1926 Selections
<input type="checkbox"/>	International Residential Code for One- and Two-Family Dwellings
<input type="checkbox"/>	Carpentry and Building Construction
<input type="checkbox"/>	Contractor's Guide to Business Law and Project Management - Tennessee Edition
<input type="checkbox"/>	NFPA 72 - National Fire Alarm Code
<input type="checkbox"/>	Ugly's Electrical References
<input type="checkbox"/>	Roofing Construction and Estimating
<input type="checkbox"/>	Pipe and Excavation Contracting
<input type="checkbox"/>	NFPA 13 - Installation of Sprinkler Systems
<input type="checkbox"/>	Modern Masonry - Brick, Block, Stone
<input type="checkbox"/>	Mathematics for Plumbers and Pipefitters
<input type="checkbox"/>	Lineman's and Cableman's Handbook
<input type="checkbox"/>	Design and Control of Concrete Mixtures
<input type="checkbox"/>	American Electricians' Handbook

Please note: Inventory and pricing subject to change without notice.

- You may also place a checkmark next to the items that you would like to order, and mail or fax this form to PSI (be sure to include your contact information). A Customer Service Rep will call you to place the order.

Mail or FAX to:
PSI ** 3210 E Tropicana * Las Vegas * NV * 89121 (Attn Shipping)
Fax (702) 932-2668

Name: _____

Address: _____

City: _____ State: _____ Zip: _____

Phone Number: _____



SPECIAL ARRANGEMENT REQUEST FORM OR OUT-OF-STATE TESTING REQUEST

All examination centers are equipped to provide access in accordance with the Americans with Disabilities Act (ADA) of 1990. Applicants with disabilities or those who would otherwise have difficulty taking the examination may request special examination arrangements.

Candidates who wish to request special arrangements because of a disability should fax this form and supporting documentation to PSI at (702) 932-2666.

Requirements for special arrangement requests:

You are required to submit documentation from the medical authority or learning institution that rendered a diagnosis. Verification must be submitted to PSI on the letterhead stationery of the authority or specialist and include the following:

- Description of the disability and limitations related to testing
- Recommended accommodation/modification
- Name, title and telephone number of the medical authority or specialist
- Original signature of the medical authority or specialist

Date: _____ Social Security #: _____

Legal Name: _____
Last Name First Name

Address: _____
Street City, State, Zip Code

Telephone: (_____) _____ - _____ (_____) _____ - _____
Home Work

Email Address: _____

Check any special arrangements you require (requests must concur with documentation submitted):

- Reader (as accommodation for visual impairment or learning disability)
- Extended time (Additional time requested: _____)
- Large-print written examination
- Other _____

Out-of-State Testing Request (this request does not require additional documentation) _____

Site requested: _____

- Complete and fax this form, along with supporting documentation, to (702) 932-2666.
- After 4 business days, please call (702) 939-6750 and leave a voice message.
- PSI Special Accommodations will call you back to schedule the examination within 48 hours.

DO NOT SCHEDULE YOUR EXAMINATION UNTIL THIS DOCUMENTATION HAS BEEN RECEIVED AND PROCESSED BY PSI SPECIAL ACCOMMODATIONS.



TN Plumbing Exam Pre-Approval Request

For TN Mechanical Plumbing (CMC/CMC-A) Exams

Pre-Approval is required by the State of Tennessee Board for Licensing Contractors in order to take the Tennessee Mechanical Plumbing (CMC/CMC-A) Exams. Verification of at least three (3) years plumbing work experience is necessary.

RETURN ALL COMPLETED TN PLUMBING PRE-APPROVAL FORMS TO THE STATE OF TENNESSEE BOARD FOR LICENSING CONTRACTORS. UPON APPROVAL, THE BOARD WILL NOTIFY THE APPLICANT AND PSI BY E-MAIL.

Applicant Information

(Check One)

- CMC-A (Plumbing) Exam
 CMC (Mechanical) Exam

Name: _____ SSN*: _____ - _____ - _____

*Disclosure: You are required to provide your Social Security Number (SSN). Your SSN will be used for identification purposes only and will not be a part of public record. This is required under the authority of 42 USC 666.

Address: _____

City _____ State _____ Zip Code _____

Telephone (____) ____ - ____ Cell (____) ____ - ____ Fax (____) ____ - ____

Email Address: _____

Experience (Attach pages 2 and 3)

- Please attach verification from municipality/county/city permit office of plumbing work. (pg 2)
 (May attach a copy of plumbing license from another agency as evidence in lieu of verification on pg 2)
- Are you an employee of a plumbing contractor? No Yes – License ID# _____
 If yes, Name of Contractor: _____
 (May attach a copy of W-2's from a plumbing contractor as evidence in lieu of verification on pg 2)
- Do you have an Engineering Degree in the Plumbing or Mechanical field?
 No Yes – Attach copy of documentation – (If yes, may be approved without pg 2 & 3)

Notarize

I hereby certify, I am at least 18 years of age, have at least three (3) years plumbing work experience, and the information submitted within this application is true and correct, to the best of my knowledge.

Applicant Signature

Affirmed, witnessed and subscribed before me this _____ day of _____, 20_____

Notary Public Signature

My Commission Expires: _____

For Office Use Only:

- | | | | |
|--|--|---|--|
| <input type="checkbox"/> Approved | <input type="checkbox"/> Additional Information Required
<input type="checkbox"/> Page 2 <input type="checkbox"/> Page 3
<input type="checkbox"/> Notary <input type="checkbox"/> Applicant Signature
<input type="checkbox"/> Other _____ | <input type="checkbox"/> Disapproved
<input type="checkbox"/> Lack of Required Experience
<input type="checkbox"/> Other _____ | <input type="checkbox"/> Other
_____ |
|--|--|---|--|

Reviewed by: _____ Date: _____



Verification of Plumbing Work Experience and/or Local License For TN Plumbing Exam Pre-Approval Request

SECTION A: To be completed by Applicant

You must provide verification of at least three (3) years of plumbing work experience in order to be approved to take the TN CMC-A or TN CMC Mechanical Plumbing Exam. In lieu of this page, you may attach a copy of W-2's from a plumbing contractor, or you may attach a copy of your plumbing license from another municipality. Otherwise, this page must be completed, signed, and submitted as verification of plumbing work experience.

Plumbing Applicant Name: _____

Address: _____

Telephone: (____) ____ - ____ **Cell:**(____) ____ - ____ **Fax:**(____) ____ - ____

Applicant Signature: _____

SECTION B: To be completed & signed by Past Employer/Contractor/Licensing Agency

The above named applicant is required to provide verification of plumbing work experience in the State of Tennessee as a requirement in order to be approved to take the TN CMC-A or TN CMC mechanical plumbing contractor's exam. Our Board appreciates your assistance, time and cooperation. Please complete, sign and return this page to the plumber applying to take the exam.

Section B completed by:

Employer/Plumber Contractor: _____

or

Licensing Agency (County/City/Municipality Permit Office): _____

Type of License: Master Journeyman Apprentice Not Applicable Other

Licensed By:

Exam - Type & Score: _____ Date _____

Endorsement- State/City/County _____

Not Applicable – State Reason: _____

Verification:

It is my opinion, to the best of my knowledge, the above named plumber applicant has the following amount and type of plumbing work experience:

Experience: 0 – 12 months More than 1 year 3 years or more

Type of Plumbing: Sewage Backflow Connection to Potable Water

Fixtures Water Heater Installation of Appliances

Water Piping Gas Piping Sprinkler/Fire Protection

Other: _____ Irrigation/Lawn Sprinklers

(SIGNATURE)

(Print Name)

(Title)

***Note: Applicants requesting pre-approval may not complete and sign Section B themselves. Section B must be completed and signed by the appropriate person/agency that is verifying plumbing work experience for the applicant.**

PSI
3210 E Tropicana
Las Vegas, NV 89121



Plumbing Work Experience

For TN Plumbing Exam Pre-Approval Request

Please list specific plumbing work experience indicating a total of at least three (3) years of plumbing work (attach additional pages if needed); OR attach a resume indicating same in lieu of this page.

Name of Employer or Customer _____

Address: _____
(Mailing Address) (City) (State) (Zip Code)

Contact Person: _____ Telephone: _____ Fax: _____

Date of Employment: _____ to _____ Total: _____/_____/_____
(Beginning) (End) Years/Months/Weeks

Type of Work: _____

Name of Employer or Customer _____

Address: _____
(Mailing Address) (City) (State) (Zip Code)

Contact Person: _____ Telephone: _____ Fax: _____

Date of Employment: _____ to _____ Total: _____/_____/_____
(Beginning) (End) Years/Months/Weeks

Type of Work: _____

Name of Employer or Customer _____

Address: _____
(Mailing Address) (City) (State) (Zip Code)

Contact Person: _____ Telephone: _____ Fax: _____

Date of Employment: _____ to _____ Total: _____/_____/_____
(Beginning) (End) Years/Months/Weeks

Type of Work: _____

Name of Employer or Customer _____

Address: _____
(Mailing Address) (City) (State) (Zip Code)

Contact Person: _____ Telephone: _____ Fax: _____

Date of Employment: _____ to _____ Total: _____/_____/_____
(Beginning) (End) Years/Months/Weeks

Type of Work: _____