
American Welding Society®

# ASME BPVC Section IX, Power (B31.1) and Process (B31.3) Piping Endorsement Description

## Introduction

This document, the ASME BPVC Section IX, Power (B31.1) and Process (B31.3) Piping Endorsement Description, provides candidates guidance in the endorsement examination process. AWS strongly advises those who apply for the endorsement examination to read this endorsement description, paying particular attention to the Test Specifications and Examination References to gain better understanding of the content covered by this exam. The examination description is subject to change.

Any applicant seeking CWI certification can take this examination as his or her initial Part C Codebook examination. To access the CWI Examination User Guide, click HERE. The CWI Examination User Guide contains important information on the rules, policies, procedures, and exam content for those intending to take the CWI exams.

## Endorsement Scope

The ASME BPVC examination covers select content from three standards:

- *ASME Section IX Welding, Brazing, and Fusing Qualifications*
- *ASME B31.1 Power Piping*
- *ASME B31.3 Process Piping*

AWS QC1:2016-AMD1- *Specification for AWS Certification of Welding Inspectors* provides for endorsements that may be added to the CWI and SCWI certifications. Endorsements are indication of an additional knowledge, skill or ability documented in writing and added to an individual's certification credential(s).

## Endorsement Candidate Eligibility Criteria

Existing CWIs and SCWIs who wish to obtain an endorsement which documents their knowledge, skills, and abilities in using ASME BPVC Sect. IX, Power ( B31.1) and Process (B31.3) Piping can take the examination.

## Training Requirements

This endorsement has no mandatory training requirements. Candidates are encouraged to attend training seminars or workshops related to the use of these ASME standards, or to self-study to improve their familiarity with these standards.

## Examination Requirements

Candidates seeking the ASME BPVC endorsement shall pass the ASME BPVC Sect. IX, Power (B31.1) and Process (B31.3) Piping examination.

Successful candidates must correctly answer at least 72% of the questions to pass the examination. Candidates who do not pass the exam on a first attempt may retest in accordance with the re-examination requires laid out in AWS QC1:2016-AMD1- *Specification for AWS Certification of Welding Inspectors,* Clause 6.2.

## Initial Certification or 9-year Recertification Eligibility

For candidates seeking initial certification at the CWI level, this examination satisfies the requirements of Clause 6.2.1 of AWS B5.1:2013- AMD1- *Specification for the Qualification of Welding Inspectors.*

For existing CWIs and SCWIs, successful completion of this endorsement satisfies the examination requirements for recertification under Clauses 16.2.1 or 16.3.1, as applicable, of AWS QC1:2016-AMD1- *Specification for AWS Certification of Welding Inspectors,* provided that the endorsement is taken during the immediate 9-year period.

## Test Specifications

Test Specifications are a breakdown of exam content areas appearing in the examination along with the proportion of the exam devoted to each content area.

Subject weights for each of these areas are in conformance with the Code Applications examination requirements as expressed in Clause 7.1 of AWS B5.1:2013 AMD1- *Specification for the Qualification of Welding Inspectors.*

| Content Areas | Minimum Percent of Questions on Exam |
|---|---|
| Qualification | 25% |
| Fabrication | 25% |
| Inspection | 25% |
| Reports and Records | 5% |
| Materials and Design | 5% |

## Examination Details

The open-book examination consists of 60 four-option multiple-choice items. The first 26 test questions relate to ASME's B31.1 standard concerning to power piping. The next 18 test questions refer to the Boiler and Pressure Vessel Code, Section IX. The final group of 16 test questions relate to ASME's B31.3 standard concerning process piping.

## Examination Delivery

The examination is a computer-based test (CBT) delivered at Prometric Testing Centers throughout the world.

## CBT Exam Timing Information

The overall seat time allotted is 150 minutes (2.5 hours) from check-in to check-out at the test center.

The time that can be used to answer questions is 135 minutes (2 hours and 15 minutes).

| Section of Testing | Time in Minutes |
|---|---|
| Candidate Confirmation Page | 2 |
| Non-Disclosure Agreement (NDA) | 2 |
| Introduction & Tutorials | 10 |
| Exam Question Answering | 135 |
| Finish Page | 1 |
| Total | **150** |

## Examination Reference

Most exam questions are directly answerable from the provided reference. It is to the candidate's benefit to use the codebook editions indicated below as exam questions are based on the editions listed. A candidate who chooses to use a codebook edition that is not listed does so at his/her own risk. AWS bears no responsibility for a candidate's failure to obtain certification as a result of this choice.

- *ASME Section IX Welding, Brazing, and Fusing Qualifications – 2019*
- *ASME B31.1 Power Piping – 2018*
- *ASME B31.3 Process Piping – 2018*

Candidates are permitted to bring printed copies of any of the three standards listed above. Codebooks used during the exam must be the original or permanently bound printed copy (as by stitching or glue), or securely fastened in its cover by fasteners that penetrate all pages. Printed Codebooks may be annotated or tabbed, but no loose sheets of paper or sticky notes are permitted (other than published errata).

PDF versions of the three standards will be accessible on-screen for this exam. The PDF reference is searchable. AWS recommends becoming proficient at navigating digital codebooks prior to the exam. For example, experience using PDF bookmarks to navigate standards can help test-takers find important portions of the codebook more quickly. Candidates not familiar with navigating conventional PDF documents are welcome to review the computer-based testing frequently asked questions (CBT FAQs) found HERE. Some features of conventional PDF navigation may be disabled by Prometric for security reasons.

## Endorsement Fee Structure

For candidates in the United States and Canada, exam fees are due at time of registration and are paid directly to AWS. For the AWS exam price list, click HERE.

For international (outside of the US and Canada) candidates, exam fees are due at time of registration and paid to the International Agent representing AWS. Agents can provide pricing information regarding international exams. At this time, the ASME BPVC Section IX, B31.1 (Power Piping) and B31.3 (Process Piping) is only offered in English.

## Endorsement Credential

Endorsements earned will be updated in each CWI or SCWI's certification profile on the AWS website. Status can be checked via the QR code on the back of the CWI wallet card or via the Quikcheck web link.

## Renewal Requirements

If the exam was taken as an initial Part C exam and the candidate has become a CWI eventually, the candidates is required to renew the CWI Certification every 3 years and every 6 years and recertify every 9 years.

Once all renewal requirements have been met via the renewal application and all administrative fees have been paid in full, the CWI Certification will be renewed. For further information concerning the CWI Certification renewal, click HERE to review the QC1 *Specification for AWS Certification of Welding Inspectors.*

The endorsement does not have any requirements for renewal. It will automatically be renewed at each CWI renewal or recertification. The endorsement will continue to be listed in an approved manner.

## Professional Development Hours

Candidates who successfully complete pre-exam training to prepare for the ASME BPVC Sect. IX, Power (B31.1) and Process (B31.3) Piping endorsement examination may gain Professional Development Hours (PDHs) in accordance with QC1 clause 16.5.

Candidates who successfully pass the ASME BPVC endorsement examination and desire to gain Professional Development Hours (PDHs) should contact the AWS Certification Department.