

## New Commercial Buildings or Additions

- Commercial Building Permit Application
- Site Plans
- Exterior Lighting Plan
- Soil Report
- Storm Drainage Calculations and Details
- Complete Sets of Construction Drawings, including Landscape, Exterior Lighting, and Exterior Building Elevations
- Structural Calculations
- Non-Residential Energy Code  
(Forms available from <http://www.neec.net/energy-codes>) to include envelope, lighting, and mechanical, if applicable
- Testing Laboratory Designation Form
- Legal description and tax parcel number
- Fire flow - (contact your water purveyor.  
For City of Kent Water Customers, email [criege@KentWA.gov](mailto:criege@KentWA.gov))
- Fire Impact Fee Information Sheet

### Minimum Requirements for Construction Drawings

Plans shall be designed using the 2021 editions of the International Building Code (IBC) and International Mechanical Code (IMC), and the 2021 Uniform Plumbing Code (UPC), and the 2021 edition of the Washington State Energy Code (WSEC) as adopted and amended by the State of Washington and the City of Kent. Plans and general notes, soils reports, and engineering calculations based on other codes will not be accepted.

Plans shall be of sufficient clarity to indicate the location, nature, and extent of the work proposed and show that it will conform to the provisions of the adopted Codes and ordinances.

Acceptable drawings sizes are 24" x 36" drawn to an appropriate scale as listed below. Plans shall be drawn in indelible ink. Plan sheets that are cut and pasted, taped, or that have been altered by any means (pen, pencil, marking pens, etc.) will not be acceptable for plan check.

Washington State law requires that any registered professional who prepares or supervises the preparation of drawings and

construction documents stamp and sign such documents. Where multiple copies of stamped submittal documents are submitted, at least one set must bear an original wet seal.

Deferred submittals must be listed by the architect or engineer on the plans and submitted to the building official for review. The architect or engineer of record shall be responsible for reviewing and coordinating all submittal documents prepared by others, including deferred submittal items, for compatibility with the design of the building. IBC Sec 107.3.4.1

When special inspection is required by IBC Section 1704, the architect or engineer of record shall indicate the portions of work that require special inspection on the construction drawings. IBC Sec 110.3.10

### Occupancy Classification

Classify the building. Compute the floor area and occupant load of the building or portion thereof. See Chapter 3 of 2012 IBC. Determine the occupancy group that the use of the building or portions thereof most nearly resembles. Specify the occupancy group(s) and/or use of all rooms or areas. Provide complete dimensions and floor areas to verify the occupant load of the building.

### Type of Construction

Determine the building's type of construction by the building materials used and the fire resistance of the parts of the building. See IBC, Chapter 6.

### Location on Property

Provide dimensions on the site plan to show the clearance to property lines, public ways, and adjacent buildings. Show compliance with IBC Tables 503, 601, and 602 for the fire resistance of exterior walls. See Section 503.

### Soils Report

Investigation and analysis of soils prepared by a Washington State licensed geotechnical engineer will be required under the following conditions:

- 1. When foundations are supported by fill material.
- 2. Unless the foundation design is based on 1,500 psf or 1,000 psf for the Valley.

## Allowable and Actual Floor Area

Provide an allowable floor area calculation for the building and specify the actual square footage for each floor and/or mezzanine. See Table No. 503 for basic allowable floor area based on occupancy group and type of construction. See Section 506 for allowable floor area increase based on location on property and installation of sprinklers. See Section 506.3 , 506.4 and 506.5 for allowable area of multi-story buildings. See Section 505.2 for allowable area of mezzanines and 506.4 for basements. See Section 506.4 for allowable area determination. When fire walls are used to create separate buildings, a separate allowable area calculation must be provided for each such building. See Section 706.

## Height and Number of Stories

- 1. Compute the height of the building, IBC Chapter 5, and determine the number of stories. See Table 503 for the maximum height and number of stories permitted based on occupancy group and type of construction. See Section 504 for allowable story increases.
- 2. Review the building for conformity with the occupancy requirements in Sections 303 through 312.
- 3. Review the building for conformity with the type of construction requirements in Chapter 6.
- 4. Review the building for conformity with the exiting requirements in Chapter 10.
- 5. Review the building for conformity with the accessibility regulations in IBC Chapter 11, ICC ANSI A117.1-03 & Section 3409.

Provide a brief narrative that describes the use or activities to be conducted within the building and include the following information on the site plan or title sheet:

- Tax lot parcel number or legal description
- Type of construction - (Use IBC Chapter 6 classifications)
- Occupancy type(s) - (Use IBC Chapter 3 Classifications)
- Total allowable area of building - (Use IBC Chapter 5 & Table 503) provide an allowable area calculation. If fire walls are used, provide a separate allowable area calculation for each "building" see IBC Sec.706.
- Specify actual floor area - Break down in square feet by: occupancy types; use of rooms or areas (i.e., warehouse, office, and spray booth); area per story or mezzanine; area of covered entries or docks.

## Site Plan

- 1. Scale and north arrow. Max. scale 1"= 40' (Preferred scale 1" = 20' or 1" = 40')
- 2. Clearly delineate the property lines and easements. Show dimensions of lot. Specify street names and provide vicinity map. Provide the dimensions from the building to the property line and to the centerline of public way and from the building to adjacent structures. Only legally recorded railroad or other easements subject to the discretion and approval of the building official may be used as yards to determine allowable area.
- 3. Show landings at exit doors and stairways and provide a description of the materials that are to be used to provide the required firm and stable path leading to public way.
- 4. Show driveways with turning radiuses that were specified at the predevelopment meeting. Show on-site fire lane. Show vertical and rolled curbs and define driving surfaces.
- 5. Show fire hydrant locations.
- 6. Show an accessible route of travel connecting the public way to the accessible building entrances.
- 7. Clearly designate the location of the accessible parking spaces required per IBC Table 1106.1. Parking spaces shall be designed to meet IBC Sec.1106.6/ ICC/ANSI A117.1-03 Sec 502.
- 8. Show that exterior accessible routes of travel are illuminated per IBC Chapter 11 & ICC/ANSI A117.1-03.
- 9. Show a space for the storage of recycled materials and solid waste. WAC 51-30-009. Show location of trash enclosure.

## Floor Plans

- 1. Specify scale and show north arrow (1/4" or 1/8" scale).

- 2. Provide dimensions, square footage and clearly label the use of all rooms or areas.
- 3. Provide wall legends. Delineate all wall types including but not limited to: new, existing, bearing, non-bearing, wood, steel, shear, and demising, partial height. Delineate between insulated and non-insulated, demolished, relocated, etc. Provide accurate wall legends that match the structural plans and the energy calculations. Clearly label all rated fire resistive assemblies, including but not limited to, fire walls, fire barriers, occupancy separations, horizontal exits, rated corridors, stair and shaft enclosures. Provide reference number, and manufacturer's written description and pictorial detail on plans.
- 4. Show the location and specify the opening and header sizes for all windows and doors. Show the direction of door swing for all doors. Provide accessibility at doors per IBC Sec. 1105.
- 5. Glazing required to be safety glazing per IBC Sec. 2406 shall be identified on plans.
- 6. Show water fountains, built-in cabinets, counters, tables, chairs and permanent fixtures.
- 7. Unless separate mechanical, electrical, sprinkler and alarm plans are submitted these items should be detailed on the floor plans.
- 8. Show plumbing fixtures per IBC WA. State Amendment Sec. 2902 and Table 2902.1. Show all plumbing dimensions for supply lines and drains.
- 9. Show location of sprinkler riser.

## Building Cross Sections and Interior Elevations

- 1. Provide full height sections through the building. Provide sections through second stories or mezzanines. Show complete load paths.
- 2. Provide a sectional view through each interior stairway. Show rise, run, landings, handrails, and guards to comply with IBC Sec 1009 & 1012. All handrails must extend not less than 12 inches beyond top riser and at least one tread beyond the bottom riser, and must return to a wall, guard or walking surface not less than one tread depth beyond the bottom riser. Open risers are not permitted unless they meet one of the exceptions listed in IBC 1009.4. ICC/ANSI 117.1-03, Sections 504.3, 505.10.2, and 505.10.3.
- 3. Provide typical wall sections that detail all framing conditions for this project. Show components of wall including finish materials, vapor barriers, and insulation. Show weather resistive barrier.
- 4. Provide lateral bracing detail at a minimum of 8' o/c. for walls > 8' in unsupported length for interior partitions or provide an engineered alternative.
- 5. Show floor/ceiling, or ceiling construction (size and spacing of joists) and specify R-value of insulation.
- 6. Show all doors and windows on interior elevations and specify sizes unless shown on schedule.

## Exterior Elevations/Details

- 1. Provide exterior elevations of front, sides, and rear of building.
- 2. Show elevation of grade adjacent to building.
- 3. Specify finish floor, ceiling, roof and parapet heights.
- 4. Show all exterior doors and openings and architectural features of the building or structure.
- 5. Show parapets and other building appendages including loading docks, covered areas, exterior balconies and stairways.
- 6. Provide detail of trash enclosures.
- 7. Provide a sectional view through each exterior stairway. Show rise, run, landings, handrails, and guards to comply with IBC Sec 1009 & 1012. All handrails must extend not less than 12 inches beyond top riser and at least one tread beyond the bottom riser, and must return to a wall, guard or walking surfaces not less than one tread depth beyond the bottom riser. Open risers are not permitted unless they meet one of the exceptions listed in IBC 1009.4. ICC/ANSI 117.1-03, Sections 504.3, 505.10.2, and 505.10.3. Guards must have intermediate rails or an ornamental pattern such that a sphere 4" (102 mm) in diameter cannot pass through up to a height of 42 inches unless they meet requirements for exceptions noted in IBC 1013.3.

## Fire Resistive Elements

- 1. Materials and systems used for fire resistive purposes

shall be limited to those specified in IBC Sec. 703. Show that building elements comply with fire-resistive requirements of IBC Chapter 7.

- 2. Provide construction details of all fire resistive construction and specify the Item Number from IBC Tables No. 720.1(1), 720.1(2), 720.1(3), or the Gypsum Association File No. from the Fire Resistance Design Manual for all fire resistive assemblies, or other assemblies tested to ASTM E119 or UL 263. Provide full height wall details that clearly detail all fire-resistive construction. Details shall show walls to be continuous from the foundation to the roof sheathing or as otherwise necessary to show a complete separation between occupancies, types of construction, or areas.
- 3. Provide sections of fire-resistive floor/ceiling assemblies.
- 4. Vertical occupancy separations should afford a complete separation and should extend through underfloor and attic areas, including areas where fire-resistive ceilings are specified. Horizontal occupancy separation should be supported with a structural system having equivalent fire-resistive protection.
- 5. Provide specific details where rated assemblies intersect with walls, floors, ceilings or roofs.
- 6. Area separations, occupancy separations, horizontal exits, one-hour corridors, stair and shaft enclosures shall be clearly identified on the plans and the rating of assemblies shall be specified.
- 7. Approved fire-resistive assemblies, including but not limited to, membrane penetrations, fire doors, fire windows, or fire dampers, and all required hardware, anchorage, frames and sills shall be detailed and specified to comply with IBC Chapter 7. Include the rating for doors and other openings on door and window schedules.
- 8. One-hour walls and ceilings of rated corridors shall be of not less than one hour fire resistive construction (see exceptions). IBC Sec 709. and Table 1018.1 Architectural cross sections through corridors shall be provided.
- 9. Provide details for parapets on fire resistive exterior walls and area separation walls. IBC Sec 705.11 and 706.

## Exiting Plan

- 1. The occupant load of each room or area shall be determined per IBC Sec 1004 and Table 1004.1.1. Every building or portion thereof shall be provided with exits as required by IBC Chapter 10. The number, width, arrangement, travel distance, and exiting through adjoining rooms shall be considered in the design. Door width, height, swing and hardware; interior and exterior stairways and ramps shall be completely detailed on the plans.
- 2. Identify required exits and show required exit signage. When two or more exits are required, exit signs shall

be installed at the required exits from the area served and where otherwise necessary to clearly indicate the direction of egress. Exit signs must be illuminated at all times. In case of primary power loss, the exit signs must remain illuminated for at least 90 minutes. Emergency systems power must be supplied from storage batteries, unit equipment, or an onsite generator. IBC Sec. 1006.3 & 2702.

- 3. Show an accessible route of travel to all portions of the building, to accessible building entrances, and connecting the building and the public way. The accessible route of travel shall comply with the design requirements of IBC Sec. 1104.
- 4. Where more than one means of egress are required from any accessible space, the space must have a minimum of two accessible means of egress. IBC Sec. 1007.1.
- 5. Show areas of refuge per IBC 1007.6.
- 6. Per IBC Sec. 1105.1, at least 60% of all public entrances, and all entrances called out in IBC Section 1105.1 – 1105.1.6, shall be accessible. Provide complete construction details to demonstrate that required ramps comply with IBC Section 1010 & ICC/ANSI A117.1-03, including but not limited to: slope and rise, width, landings, handrails, and edge protection. Provide details for other features per IBC 51-50-1109.

## Ceiling Plans

- 1. Provide reflected ceiling plan with location of light fixtures. Insulation cannot be placed on suspended ceilings containing recessed light fixtures unless lights are IC rated (provide listing).
- 2. Ceiling framing plans must specify size, grade, species or gauge, and spacing of ceiling joists.
- 3. Clearly detail required fireblocking and draft stopping in combustible construction. IBC Section 717. Provide construction details for draft stops and draft curtains. Draft stopping materials shall be specified as one of the materials listed in IBC 717.3.1; fireblocking materials shall be specified as one of the materials listed in IBC 717.2.1.
- 4. Provide cross section of and lateral bracing detail for suspended ceilings.
- 5. Metal suspension systems for acoustical tile and for lay-in panels must satisfy all requirements of ASTM C635, ASTM C636, ASCE 7.

## Accessibility for the Disabled

Provide floor plans and elevations of sufficient detail to show that the building and site facilities are accessible to persons with disabilities per Chapter 11 of IBC & ICC A117.1-03.

- 1. Plans must show an accessible route of travel throughout the building. An accessible route of travel is a continuous unobstructed path connecting all accessible elements and spaces in an accessible building or facility that can be negotiated by a person using a wheelchair and is usable by persons with other disabilities.
- 2. Provide floor plans and elevations with dimensions for restrooms, kitchens, counters, and similar fixed facilities showing compliance with barrier-free access requirements.
- 3. Door schedule shall specify that door locksets and latch sets will have lever, push operated, or other devices openable by wrist or arm pressure.
- 4. In an existing building, to the maximum extent feasible, the path of travel to altered areas shall be made accessible. The accessible route means a continuous, unobstructed path of pedestrian passage by means of which an altered area may be approached, entered, and exited, and which connects the altered area with an exterior approach (including sidewalks, streets, and parking areas), an entry to the facility, and other parts of the facility. (This includes restrooms, telephones, and water fountains serving the altered area).
- 5. Provide a detail or note stating that accessible parking spaces will be identified by the International Symbol of Accessibility and the phrase "State Disabled Parking Permit Required." Such signs shall be 60 inches minimum above the floor of the parking space, measured to the bottom of the sign. The signs will be white on a blue background. IBC 1101.2.9, ICC/ANSI A117.1-2003, Sections 502.7 and 703.6.3.1.

## Energy/Light/Ventilation

The plans shall show in sufficient detail all pertinent data and features of the building and the equipment and systems including but not limited to: design criteria, exterior envelope component materials, U-values of the envelope systems, R-values of insulating materials, size and type of apparatus and equipment, equipment and systems controls, light fixture schedules with wattage and controls narrative and other pertinent data to indicate compliance with the requirements of the 2018 Washington State Energy Code, WAC 51-11 (WSEC). Non-Residential Energy Code Compliance Forms must be completed and submitted with permit application. They are available at <http://www.neec.net/energy-codes>.

- 1. Provide an architectural section for each roof, ceiling, wall and floor. Specify the R-value and type of insulation to be installed. Detail each assembly to match the energy calculations.
- 2. Provide a window schedule that shows the percentage of total glazing area (vertical and overhead) relative to the gross exterior wall area. WSEC Sec. 1312 and Table 13-1. Glazing U-factors and solar heat gain

coefficient should be noted on the window and door schedules per WSEC Table 13-1 and Sec. 1323.

- 3. All portions of buildings are assumed to be at least semi-heated per WSEC Sec. 1301. Details should be provided to show that the roof is insulated per WSEC 1310.2.
- 4. The lighting wattage shall not exceed the lighting power allowance calculated in accordance with the 2006 Washington State Energy Code Sec. 1520 or 1530. The lighting power budget shall be the sum calculated by multiplying the gross conditioned floor area, in square feet, by the appropriate unit power budget, in watts per square foot, specified in WSEC Table 15-1. Provide electrical plans and energy calculations. Show interior and exterior lights and switching on drawings (this item cannot be deferred).
- 5. The minimum requirements for operable area to provide natural ventilation required in the IBC shall be shown or indicate that a mechanical ventilation system(s) will be provided that is capable of supplying the minimum outdoor air quantities specified in the 2009 International Mechanical Code Section Sec. 403 to each zone.

## Roof

- 1. Roof framing plans must show the size and spacing of glulams, purlins, rafters and ceiling joists and/or provide engineer signed truss plans and calculations. Prefabricated truss calculations and drawings must be submitted.
- 2. Show smoke and heat vents and curtain boards per IBC Sec 910
- 3. Show required roof ventilation per IBC Sec. 1503.5 & 1203.2.
- 4. Provide details of roofing materials including insulation. Insulation shall comply with IBC Sec. 719.5
- 5. Overflow drains having the same size as roof drains connected to drain lines independent from roof drain lines shall be provided. Provide details for required roof drainage. UPC Chapter 11.
- 6. Show location and provide construction details for required roof access hatch. IBC Sec 1009.11 & 1509.

## Structural Design

- 1. Provide a copy of the soils investigation and evaluation report. Soils report shall be based on the 2018 IBC and be stamped by a Washington State licensed soils engineer and shall include the following:
- 2. A site plan showing the location of all test borings and/or excavations.
- 3. Descriptions and classifications of the materials encountered.
- 4. Elevation of the water table.
- 5. Recommendations for foundation type and design criteria, including bearing capacity, provisions to mitigate the effects of expansive soils; provisions to mitigate the effects of liquefaction, and soil strength and the effects of adjacent loads per IBC Sec 1803.
- 6. The geotechnical engineer should specify the amount of total and differential settlement expected for the building. Settlements greater than 1" total and ½" differential need to be addressed by the structural engineer.
- 7. Structural calculations shall be of sufficient detail and clarity to show that the structure has been designed to conform to the structural engineering regulations and requirements for the materials of construction. See IBC Chapters 16 through 23. Design for Seismic Design Category D2, Ground Snow Load 20, and Wind Speed 85 mph. Provide a breakdown of the loads used in design for each portion of the structure including, but not limited to glulams, purlins, subpurlins, columns, wall panels, wall anchorage to trusses or purlins; concrete jamb designs; truck door lintels; spandrels; retaining walls at truck doors and stair entrances. Load combinations shall be as prescribed in the IBC. General notes shall specify the design values of the materials used.
- 8. Details should be provided to show how roof and floor diaphragm loads will be transferred to vertical shear-resisting elements and to show how loads in vertical shear-resisting elements will be transferred from level to level. Connections should be justified with structural calculations for compliance with the allowable values. The effects of overturning on vertical diaphragms shall be investigated in accordance with Sec. 1604.

## Foundation Plan

- 1. Scale and north arrow.
- 2. Foundation plans and engineering shall incorporate the recommendations of the soils report.
- 3. The plans should show the type and extent of the structural fill below the footings and slabs according to the geotechnical report. Specify reinforcement type, size, and spacing in slabs.
- 4. Show location and size of exterior and interior bearing footings and foundations. Specify pier sizes and provide foundation sections. Provide a footing schedule that specifies footing size and depth and that specifies size and spacing of horizontal and vertical reinforcement.
- 5. Identify shear and retaining walls and show closure strips. Provide sections of these elements.

## Precast Wall Panels

- 1. In Seismic Design Category D2, reinforced concrete structures resisting forces induced by earthquake motions shall satisfy the requirements of IBC Sec. 1613.
- 2. Provide panel elevations showing openings and reinforcement.
- 3. Provide panel connection details. Detail nonshrink type grout between panels and footing.

## Design Details and Detail References

- 1. May be provided by the engineer or the designer and must be incorporated into the plans.
- 2. Must agree with engineering and framing plan.
- 3. Blocking, bridging, nailing, straps approved framing anchors or mechanical fasteners shall be shown to provide continuous ties from the roof to the foundation. Provide details and references for connections at each configuration.
  - Roof to exterior and interior walls top plate or beam, including gable end.
  - Exterior wall to wall, beam, blocking or foundation.
  - Interior wall to wall, beam, blocking or foundation.
  - Pony walls to wall above and foundation below.
  - Beam to column to foundation.
- 4. Openings in diaphragms shall have perimeter members detailed to distribute shear stresses.

## Structural Cross Sections

- 1. Special reinforcement for columns shall be detailed as required in IBC Sec. 1907.8.
- 2. Show details of concrete walls anchored to all floors, roofs, and other structural elements, which provide required lateral support for the wall.
- 3. Provide typical wall, floor/ceiling and roof/ceiling assembly details as necessary to show typical framing conditions for this project. Specify all components including finish materials, fasteners, vapor barriers, and insulation.
- 4. Interior walls that exceed 6 feet in height shall be able to resist a horizontal load not less than 5 psf. Detail lateral bracing on drawings. Sec. 1607.13.
- 5. The deflection of interior walls shall not exceed that specified in IBC Sec. 1607.13 & Sec 1613/ASCE 7 Sec 9.14.5.1.
- 6. Provide cross section of floors and ceilings and detail lateral bracing.
- 7. Provide full height details for all mezzanines and stairways. Details must specify framing members, spacing and finishes. Provide details of the guards per IBC Sec 1013. Guards shall be designed to sustain the special loads specified in IBC Sec 1607.7.
- 8. Provide roof-framing sections.

## Schedules and Plans

All schedules shall be clear, readable, and shall be referenced on each plan sheet showing locations.

- 1. The foundation plan shall show all holdown types and locations.
- 2. The foundation plan shall show either each different anchor bolt spacing or schedule references.
- 3. Floor plans shall show each shear wall type and location.
- 4. Floor framing plans shall show straps, drag struts, blocking and detail references.
- 5. Roof framing plans where trusses are used for interior shear wall connections, design loads shall be noted on the plans and the truss engineer shall design for such loads.

## Framing Plans

- 1. Scale and north arrow.
- 2. Provide framing plans for all roofs, ceilings, and floors. Specify the size, span, spacing, species and grade or gauge of all vertical and horizontal wood or steel framing members.
- 3. Connections that resist seismic forces shall be designed and detailed on the drawings.
- 4. Provide attachment details for top and bottom plates. Specify size and spacing of fasteners. Provide deflection details for full height non-bearing walls.

- 5. Specify size, species, and grade of posts under beams. Specify size and gauge of all steel columns. Show connections, beam to beam, beam to post, post to foundation using approved metal connectors or other positive connection.
- 6. Specify size, grade, and species of headers for openings.
- 7. Specify panel identification index for plywood floor and roof sheathing. **IBC Sec. 2304** and Table 2304.7(1), 2304.7(2), 2304.7(3), 2304.7(4), 2304.7(5). Plywood roof sheathing shall be bonded with exterior glue. The nailing schedule for plywood diaphragms and shear walls should be shown on plans. Details must agree with calculations.
- 8. For nonstructural components (including, but not limited to, mechanical systems, machinery and equipment required for life-safety systems, fire suppression systems, and tanks) provide calculations and details to show that components and their attachments, including anchorage and required bracing, have been designed to resist lateral forces per IBC Sec 1613.
- 9. Nailing for gypsum wallboard (lath) (sheathing board) (stucco) used structurally on shear walls should be in accordance with IBC Table 2306.7.

## Roof

- 1. Roof framing plans must show the size and spacing of glulams, purlins, rafters and ceiling joists; and/or provide engineer signed truss plans and calculations. Prefabricated truss calculations and drawings should be submitted. Submittal of truss drawings may be a deferred if a truss layout showing loads and load paths is provided and the truss design is specifically listed on the plans as a deferred submittal item per IBC Sec.107.3.4.2.
- 2. Provide roof diaphragm nailing plan and schedule. Detail joist bridging where required.
- 3. Roof members shall be designed to include mechanical and sprinkler weights.
- 4. Unless roof is specifically designed for water accumulation, roof systems shall be sloped per IBC Sec. 1507.
- 5. Clearly detail required ventilation.
- 6. Provide details of roofing materials including insulation.
- 7. Show location and provide construction details for required roof access hatch.
- 8. Welding data or details for steel decking used as a diaphragm should be provided. Information should comply with a specific evaluation report or test data should be submitted in compliance with IBC Sec. 104.11.1 & Sec 104.11.2.