



# New Homes

1245 West Hwy 96 Arden Hills, MN 55112

651-792-7800

[www.cityofardenhills.org](http://www.cityofardenhills.org)

This handout is intended only as a guide and is based in part on the 2020 Minnesota State Building Code, Arden Hills City ordinances, and good building practice. While every attempt has been made to insure the correctness of this handout, no guarantees are made to its accuracy or completeness. Responsibility for compliance with applicable codes and ordinances falls on the owner or contractor. For specific questions regarding code requirements, refer to the applicable codes or contact your local Building Department.

## **BUILDING PERMITS**

Building permits are required for most projects including decks with the following exception: freestanding decks, regardless of size, if they are not more than 30 inches above adjacent grade. Freestanding decks do not require footings that extend below the frost depth.

Building permits are not required for patios made of concrete or pavers on grade.

Building permits can be obtained from the Building Department by filling out and signing an application and submitting your building plans. Building permits are typically processed within 5 -10 business days after receiving a complete set of plans. **If your application is incomplete it will delay your project.**

## **GENERAL NOTES**

1. The stamped "Approved" plan and the Inspection Record Card shall be made available to the inspectors during their inspections. As per MN2020 IRC, in accordance with 1300.0120 Subp. 13, the building permit shall be kept on site of the work until the completion of the project. Pursuant to Minnesota Statutes, Section 15.41, It shall be posted in a prominent location in the area of construction. If the card is not on site, the inspection may be failed as per Subp. 12
2. Separate permits are required when installing electrical wiring, heating equipment, or plumbing fixtures. Contact the Building Inspection Division for information regarding plumbing and heating, or call the contracted electrical inspector for electrical information.
3. Call the Building Inspection Division between the hours of 8:00 a.m. and 4:30 p.m. to arrange for an inspection. Please provide the permit number with your request. Call the contracted Electrical Inspector between the hours of 7:00 a.m. and 8:30 a.m. to arrange for an inspection. Please provide the permit number with your request.

## **PERMIT EXPIRATION**

If you suspend work on your project for more than 180 days since permit issuance or your last inspection, your permit will expire. If unforeseen circumstances delay construction, contact the Building Department **before** your permit expires.

## **PLANS**

The Building Department has a handout illustrating what needs to be included on your plans. It is very important that your plans depict exactly how your project will be built. Plans must be neat and be of a scale of at least  $\frac{1}{4}'' = 1'$ . **Computer generated plans from home stores are not acceptable and will be returned.** Plans are reviewed for code compliance and a copy is returned to the applicant with notes to identify required corrections. The plan review can only be as good as the information provided on the plans. PLEASE REVIEW THE PLANS WHEN THEY ARE RETURNED TO YOU SO THAT YOU WILL BE AWARE OF ANY CORRECTIONS NEEDED. The City only maintains plans for one year after completion of a residential deck. You may wish to retain a copy of your approved plans, permits, and inspection record cards for any future needs.

### **REQUIRED PLANS**

1. A certificate of survey or a site plan drawing with the following information:
  - a. Lot size and all adjacent public streets.
  - b. Exact location and dimensions of all existing and proposed buildings on lot.
  - c. Owner must be able to show corner monuments on the site to the satisfaction of the building inspector.
  - d. Statement of elevation where elevation is not shown on survey.
  - e. A registered or certified survey.
  - f. If trees are being impacted by the project, the location and trunk diameter of all trees on the lot.
  
2. **A completed and signed permit application.** The permit application is not valid without a signature and date.
  
3. Two sets of construction plans drawn to scale showing the following:
  - a. A floor plan indicating the following:
    - Proposed addition size
    - Size and spacing of floor joists.
    - Size of decking.
    - Size, location and spacing of posts.
    - Size of header.
    - Size and spacing of roof rafters.
    - Plan of adjoining rooms with window and door sizes.
  - b. Cross section of either a side view or a rear view indicating the following:
    - Diameter and depth of footings including landings and stair footings.
    - Size of posts and method of anchorage to footings.
    - Header size supporting floor joists.
    - Floor joist size, spacing and type of lumber.
    - Flooring material.
    - Insulation values for the foundation, rim joist, floors, walls, windows, doors, and ceiling, showing compliance with the State energy code.
    - Guardrail height (if any) – see attached handout.
    - Location of handrails.
    - Ceiling height.
    - Header size over glazed and screened openings.
    - Type(s) of sheathing and siding materials.
    - Size and spacing of roof rafters.
    - Pitch of roof.
    - Roofing material

- c. Elevations indicating the following:
  - Height of structure from established grade.
  - Mid-point height of slope.
  - Size of headers.
  - Type of roof covering materials.
- 4. All permit fees are based on a published fee schedule. This schedule can be obtained from the Building and Inspections Division.

**What is a Site Plan?**

A Certificate of Survey is required for new home construction if an existing property does not have a Certificate of Survey on file when applying for a building permit for a proposed addition, garage, deck or other structure, a new Certificate of Survey will need to be prepared. In some cases, the City may waive the survey requirement and allow the submittal of a Site Plan.

A Site Plan is a plan drawn to scale showing the uses, structures, and other features proposed for a specific parcel of land.

A Site Plan should include the following information:

- Property lines with lot dimensions.
- Exterior dimensions of all existing and proposed structures, with dimensions to property lines.
- Existing property contours to sufficiently show current drainage from site and new proposed contours indicating drainage flow.
- Total existing and proposed impervious surface, including driveways, patios, pools, and structures.
- Location of all easements.
- If trees are to be impacted by the project, the location and size of any significant trees located on the site.
- Name, address and phone number of the property owner.
- Address of the construction site.
- North arrow and scale.

**Attached are examples of a site plan and floor plan drawings**

**Required Setbacks\***

	<b>Front</b>	<b>Rear</b>	<b>Side **</b>	<b>Corner Lot Side</b>
<b>R-1 District</b>	40	30	10/25	40
<b>R-2 District</b>	40	30	5/15	40
<b>Detached Structures</b>	Behind Principal Structure	10	10	Behind Principal Structure

\* Setbacks are measured from the property line, not the curb.

\*\* (Minimum Setback/Total of both side yards on a lot)

**Finding Your Property Line**

Property lines are usually marked with metal pins, also referred to as monuments or irons. These pins are typically located at the corners of a property either at grade, or a couple inches below grade. Pins can be located with a metal detector. If the pins cannot be found then a licensed surveyor may need to be called out to the property to locate them for you. Only a licensed surveyor can legally relocate or place pins. Once the pins are identified, you can place wooden stakes in the ground to mark their location. This will assist the Building Inspector in identifying the property lines at the time of the footings inspection.

# SURVEY MARKER EXAMPLES



## **FRAMING**

1. Base plates on concrete shall be treated wood.
2. Studs supporting floors shall be spaced not more than 16 inches on center (o.c.) 2 x 4 inch studs not more than 10 feet in length and supporting ceiling and roof only may be spaced 24 inches o.c. Where studs are spaced 24 inches o.c., framing above must be centered over studs.
3. Rafters shall be nailed to adjacent ceiling joists to form a continuous tie between exterior walls when such joists are parallel to the rafter. When not parallel, rafters shall be tied to 2 x 4-inch minimum crossties. Rafter ties shall not be spaced more than 4 feet o.c.

## **LIGHT, VENTILATION AND CEILING HEIGHT**

1. All habitable rooms shall have a window area equal to at least 8 percent of floor area, one half of which shall be openable. For the purpose of determining light and ventilation requirements, any room may be considered as a portion of an adjoining room when one-half of the area of the common wall is open and unobstructed. The common wall should provide an opening of not less than one-tenth of the floor area of the interior room or 25 square feet, whichever is greater. Required windows shall open directly onto a street or public alley, or a yard or court located on the same lot as the building. Mechanical ventilation and artificial light may be acceptable complying with IRC R303.1.
2. Minimum ceiling height is 7 feet.
3. Egress window requirements. (*See egress window handout.*)

## **SMOKE DETECTORS**

1. Smoke detectors must be installed for additions, interior alterations or repair work, when a building permit is required; or when one or more sleeping rooms are added or created. Repairs to exterior surfaces only are exempt from this requirement.
2. In new construction, required smoke detectors shall receive their primary power from the building wiring with battery backup and interconnected. Wiring shall be permanent and without a disconnecting switch, other than those required for over-current protection. In existing rooms, smokedetectors can be battery operated.
3. A smoke detector shall be installed in each sleeping room and at a point centrally located in the corridor or area, giving access to each separate sleeping area. When the dwelling unit has more than one story and in dwellings with basements, a smoke detector shall be installed on each story and in the basement. Smoke detectors shall sound an alarm audible in all sleeping areas of the dwelling unit in which they are located.

## **FOAM PLASTIC INSULATION**

Must be of an approved type or covered with an approved material. Exposed foam plastic insulation is not allowed in any room, including crawl spaces and attics.

## **INSPECTIONS NEEDED**

1. Call 24 hours in advance or preferably 2 days in advance.
2. Have address, permit number, and type of inspection (ex. footing) ready.
3. Let the inspector know if you wish for an exact time and they will try to accommodate you.
4. Plans and record card on-site.
5. If work is approved, the inspector will sign the permit card and you may proceed with the next step.
6. If corrections are noted, a correction notice will be left on the site. If a re-inspection is required it will be noted on the notice.
  
7. **FOOTING, FOUNDATION AND SET BACKS INSPECTIONS** – Shall be made after forms and reinforcing are in place, loose material/water removed prior to the pouring of any concrete.
  
8. **UNDERGROUND** plumbing prior to pouring slab.
  
9. **FRAMING INSPECTIONS** – Shall be made after the rough-in inspection of plumbing, heating and electrical installation, but prior to the placement of any covering material. Means of assuring proper attic ventilation must be in place.
  
10. **INSULATION INSPECTION** – Shall be made prior to installation of interior finish. Required vapor barriers must be in place.
  
11. **FIREPLACES** – Must be inspected during construction.
  
12. **PLUMBING, HEATING & ELECTRICAL** – Require separate permits and inspections. Rough-in and final inspections are required.
  
13. **FINAL INSPECTION** – Shall be made after the structure is complete and prior to occupancy.

Please do not hesitate to call the Building Department at 651-792-7800. If necessary, we will be happy to meet with you on the site to help resolve any concerns or problems.

## **Additional Resources**

Building Official: 651-792-7813 - Building Inspector: 651-792-7818  
The Planning Department at 651-792-7810 may be able to provide the following information:

- Aerial Photo of your property
- A Survey or Plat Map
- Information about the Zoning Code and Tree Preservation Ordinance.

NOTE: For specific code requirements, please contact the Building Inspection Division. Questions regarding design and cost should be referred to a professional builder or architect.

This handout is written as guide to common questions and problems.  
It is not intended nor shall it be considered a complete set of requirements.



On April 28, 2008, the City Council adopted a new Tree Preservation Ordinance for the City of Arden Hills. The purpose of the ordinance is to enhance and protect the City's natural environment by better managing the removal of trees, creating mitigation standards for certain amounts of tree removal, and regulating the installation of replacement trees.

Frequently Asked Questions about the new ordinance:

*Can I still cut down trees?*

Yes. The ordinance does not prohibit the cutting of any trees in the City; however, some large trees that are removed must be replaced.

*Does ALL tree removal require replacement of new trees?*

No. While the ordinance applies to all private properties within the City, only those trees removed for the purposes of new construction, an addition, parking lot construction, or grading projects requiring a permit, would be impacted by the new ordinance.

*How do I know if the Tree Preservation Ordinance will impact my construction project?*

When property owners come in for a building permit that includes new building construction, an addition, or parking construction, they will now also have to submit a Tree Survey. This is a map that shows the location and size of all the trees on the lot, and which ones will be impacted by the proposed project. If more than ten percent of the "Significant Trees" on the site are impacted by the project, then some of those trees will have to be replaced elsewhere on the property.

*What is a "Significant Tree?"*

A significant tree is a healthy and structurally sound deciduous hard wood tree measuring greater than ten inches in diameter, deciduous soft wood tree measuring greater than 12 inches in diameter, or evergreen tree greater than 15 feet in height. (The diameter should be measured about 4.5 feet above the ground, and is referred to as the "Caliper Inches" of a tree). Groups of trees that are smaller but provide buffers along public streets or between differing land uses may also collectively be considered "significant".

*My project requires tree replacement, how many new trees do I have to plant?*

The amount of mitigation, or tree replacement, which is required for each project, is based on the number of caliper inches of significant trees being removed over and above ten percent. For every two caliper inches of removed trees, one caliper inch of new tree has to be replaced. For example, if you have 100 caliper inches of significant trees on your property, and your project requires the removal of 10

caliper inches, then there would be no replacement required. However, for every two inches removed over that amount, one caliper inch of replacement trees would be required.

*Why isn't the tree replacement rate one to one, instead of one to two?*

A smaller replacement ratio does require fewer trees to be planted than if the ratio was greater, but over time the new trees will grow to maturity and there will be many more trees on the property than before the removal took place. For example, if 40 inches of trees are required to be replaced, a one to one ratio would require that 20 two-inch trees are planted, far more trees than were likely on the site before.

*Can I plant any kind of trees that I want?*

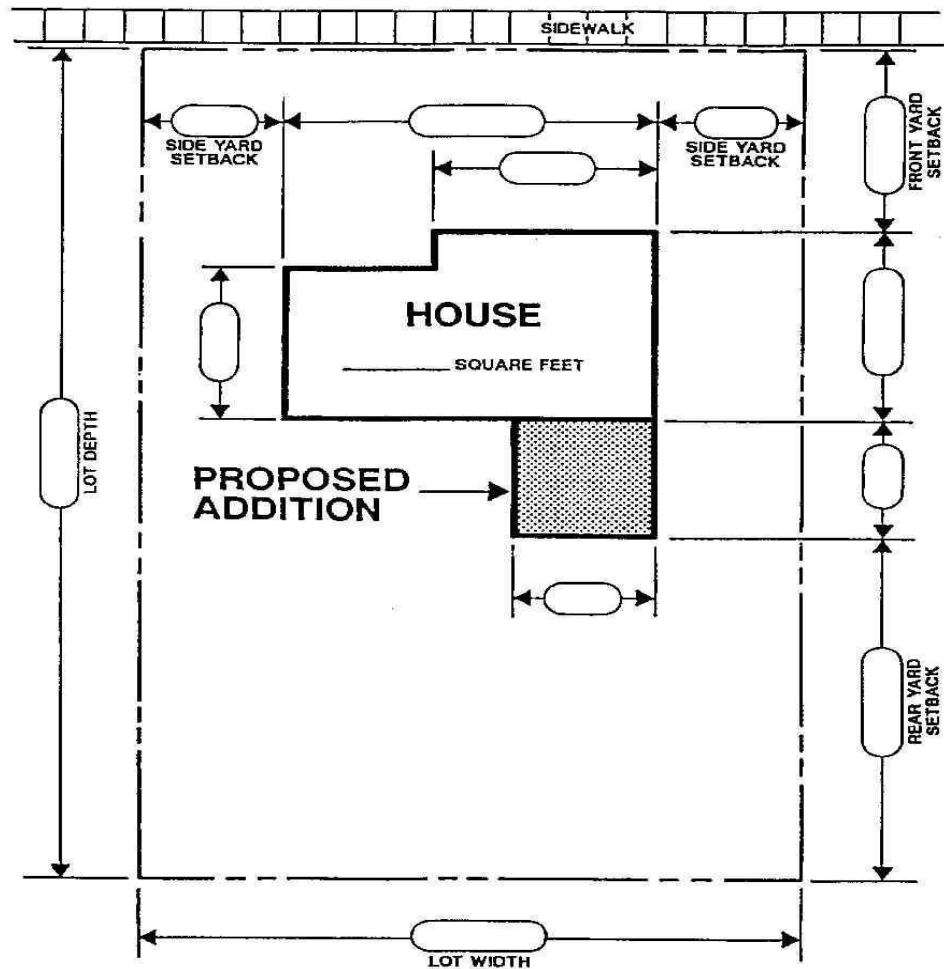
Not necessarily. The City maintains a list of "unapproved" replacement trees, which cannot be used to fulfill the requirements of the Tree Preservation Ordinance. The unapproved trees are primarily trees listed by the DNR as invasive or particularly susceptible to disease. The City also has a list of approved trees that can be used to meet the mitigation requirements. Other comparable tree species not on the list can also be planted with City Administrator approval. In general, the type of trees being removed will dictate the type of trees being replaced.

*Couldn't I just cut down all the trees on my lot before coming in for a building or grading permit and not have to count them on my Tree Survey?*

No. The Tree Preservation Ordinance applies to all trees unnaturally removed within the past two years, prior to the application for the permit. Ramsey County maintains detailed aerial photography of the entire City and these are easily used to verify the locations of trees indicated (or not indicated) on a Tree Survey. Additionally, field inspections are routinely done to verify the accuracy of submitted surveys.

*What if there isn't enough room on my lot to plant all the required trees?*

The City has developed a program that will allow excess trees to be planted off-site, in public parks, along public right-of-ways, and even on other private property. If a suitable off-site location cannot be found, then the City may charge a fee in lieu of planting for the purpose of maintaining the current tree stock and planting new trees.



EXTERIOR WALL ELEMENT		MINIMUM FIRE-RESISTANCE RATING	MINIMUM FIRE SEPARATION DISTANCE
Walls	(Fire-resistance rated)	1-hour tested in accordance with ASTM E 119 or UL 263 with exposure from both sides	< 5 feet
	(Not fire-resistance rated)	0 hours	≥ 5 feet
Projections	(Fire-resistance rated)	1 hour on the underside <sup>a,b</sup>	≥ 2 feet to 5 feet
	(Not fire-resistance rated)	0 hours	5 feet
Openings in walls	Not allowed	N/A	< 3 feet
	25% maximum of wall area per story	0 hours	3 feet
	Unlimited	0 hours	5 feet
Penetrations	All	Comply with Section R302.4	< 5 feet
		None required	5 feet

- a. Roof eave fire-resistance rating shall be permitted to be reduced to 0 hours on the underside of the eave if fire blocking is provided from the wall top plate to the underside of the roof sheathing.
- b. Roof eave fire-resistance rating shall be permitted to be reduced to 0 hours on the underside of the eave provided no gable vent openings are installed.



