

ORDINANCE NO. 2658

AN ORDINANCE OF THE CITY OF REDLANDS ADDING CHAPTER 16.04 TO
THE REDLANDS MUNICIPAL CODE TO IMPLEMENT GOALS
AND POLICIES OF THE REDLANDS GENERAL PLAN RELATING TO THE
CALCULATION OF PROPERTY SLOPES

WHEREAS, the permitted densities for development projects proposed within the various land use categories of the Redlands General Plan are often determined based upon reference to the slope of the property upon which the development project is proposed; and

WHEREAS, the goals and policies of the Redlands General Plan provide that development projects proposed on properties having progressively higher slopes be limited to progressively lower densities of development; and

WHEREAS, the Redlands General Plan further provides that for property having slopes in excess of fifteen percent (15%), buildings shall be designed to accommodate such topography with minimize grading; and

WHEREAS, the Redlands General Plan further encourages the transfer of permitted density for a specific property to those areas of the property having slopes of fifteen percent (15%) or less; and

WHEREAS, for the Redlands area, the U.S. Geological Survey provides three resolutions of digital elevation model ("DEM") data associated with the identification of property slope and contour lines; and

WHEREAS, light detection and ranging ("LIDAR") technology can provide subfoot resolution for DEMs with vertical accuracy of approximately three centimeters; and

WHEREAS, the National Oceanic and Atmospheric Administration ("NOAA") has collected Interferometric Synthetic Aperture Radar ("IfSAR") data for southern California and has included more than ninety percent (90%) of Redlands' geographical area within that data set; and

WHEREAS, IfSAR data covering Redlands is at a three meter resolution with vertical accuracy of approximately 1.04 meter; and

WHEREAS, to implement and carry out the goals and policies of the Redlands General Plan relating to the calculation of property slope and the determination of permitted densities, it is the desire and intent of the City Council of the City of Redlands that City staff employ the most accurate, reasonably available data including, but not limited to, high resolution data provided by LIDAR and IfSAR technology;

The City Council of the City of Redlands does ordain as follows:

Section 1: Chapter 16.04, entitled "Property Slope Calculation," is hereby added to the Redlands Municipal Code to read as follows:

"16.04 Property Slope Calculation

Sections:

- 16.04.010 Purpose and Intent
- 16.04.020 Applicability
- 16.04.030 Calculation of Slope
- 16.04.040 Provision of Digital Data

16.04.010 Purpose and Intent. The purpose and intent of this Chapter is to implement the goals and policies of the Redlands General Plan relating to the calculation of property slope and the determination of permitted densities by ensuring that the City employs the most accurate, reasonably available data to determine the slope of the property which is the subject of proposed development projects. As a prerequisite of determining an application for a development project to be deemed complete, an applicant shall obtain from the City's Community Development Department, a calculation of the natural cross slope of the property which is the subject of the development project.

16.04.020 Applicability. This Chapter shall apply to all applications submitted to the City for development project proposals unless the City's Community Development Director, or the Director's designee, concludes that the determination of average cross slope for a property is unnecessary to the City's processing of the development project proposal.

16.04.030 Calculation of Slope. "Average cross slope" shall be determined by the City's Community Development Department, and shall mean the method of determining the natural cross slope of property using the following equation:

$$\frac{I \times L \times .0023}{A}$$

I = contour interval in feet;

L = combined length in feet of contour lines measured on the property which is the site of the development project. Contour lines shall be produced using the highest resolution digital elevation model ("DEM") reasonably available to the City. (Coarse resolution DEMs produced overly simplified contour lines, resulting in artificially low natural core slope measurements). As higher quality DEMs become available,

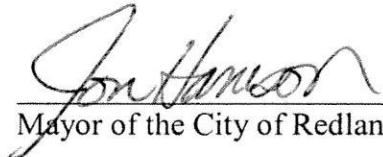
the Community Development Department shall evaluate use of such DEMs to perform the average cross slope analysis.

A = the acreage of the property which is the subject of the development project.

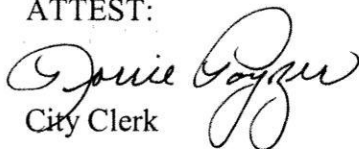
.0023 = a constant which converts square feet into acres and expresses slope in percent.

16.04.040 Provision of digital data. To assist the City in determining property slope, the applicant for a development project subject to this Chapter may be requested by the City to submit to the City one (1) copy of a digitized development project site plan and elevations, including all CAD or GIS data used in, or to produce, the plan and elevations. This data shall be in a format that requires no conversion or translation for the City to make use of the data. The data may be used by the City in its discretion dependent upon its determination of the accuracy of such determination."

Section 2. Certification. The Mayor shall sign this ordinance and the City Clerk shall certify to the adoption of this ordinance and shall cause it, or a summary of it, to be published once in the Redlands Daily Facts, a newspaper of general circulation within the City, and thereafter, this ordinance shall take effect as provided by law.

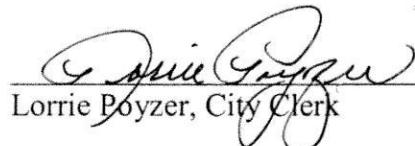

Mayor of the City of Redlands

ATTEST:


City Clerk

I, Lorrie Poyzer, City Clerk of the City of Redlands, hereby certify that the forgoing ordinance was duly adopted by the City Council at a regular meeting thereof held on the 5th day of February, 2008 by the following vote:

AYES:	Councilmembers Gilbreath, Gallagher, Aguilar, Bean; Mayor Harrison
NOES:	None
ABSENT:	None
ABSTAIN:	None


Lorrie Poyzer, City Clerk