June 17, 2008

Subject: Residential Solar Readiness Ordinance (Citywide)  Page: 1 of 1

**Issue** – Mayor and Council are asked to consider approval of an Ordinance requiring solar “stub ins” on all new single family and duplex residential dwelling units. The “stub ins” allow greater ease and convenience in subsequent solar energy system installations. The solar energy systems will provide for the use of solar energy as a means of heating domestic potable water and a means of providing electrical power.

**Recommendation** – It is recommended the Mayor and Council approve the attached Ordinance.

**Background** – On February 5, 2008 the Mayor and Council directed staff to form a stakeholder group to develop the Residential Solar Readiness Ordinance. The stakeholder group was formed with membership consisting of: Technicians for Sustainability, the Tucson Association of Realtors, the Sierra Club, the Southern Arizona Homebuilders Association, architectural professionals and representatives of solar energy installation companies. Staff support has been provided by Development Services, the City Attorney’s Office and the City of Tucson’s Solar Energy Coordinator. Stakeholder meetings were held on February 21, March 13 and April 10, 2008.

The stakeholder group recommends adoption of the attached ordinance. Additionally, the stakeholder group will continue working with staff to develop the needed additions to the appropriate codes to effectuate the ordinance. It is expected that language in the International Residential Code (IRC) will be modified to accommodate this ordinance provision. The specific code language created by the stakeholder group will be discussed and reviewed by the Joint City/County Building Code Committee before returning to the Mayor and Council for consideration.

**Legal Considerations** – The City Attorney has prepared and reviewed the attached Residential Solar Readiness Ordinance.

**Financial Considerations** – None.

Respectfully submitted,

[Signature]
Karen Masbruch
Assistant City Manager

KM:ED:eac

Attachment: Residential Solar Readiness Ordinance
ADOPTED BY THE
MAYOR AND COUNCIL

ORDINANCE NO. 10549

RELATING TO BUILDINGS AND CONSTRUCTION: REQUIRING NEW SINGLE FAMILY AND DUPLEX RESIDENTIAL DWELLING UNITS TO PROVIDE FOR FUTURE INSTALLATION OF SOLAR ENERGY DEVICES; ADOPTING APPLICABLE BUILDING CODES AND REGULATIONS, WITH LOCAL AMENDMENTS ADDING REQUIREMENTS RELATED TO SOLAR ENERGY; AND DECLARING AN EMERGENCY.

WHEREAS, it is the intent and purpose of the City of Tucson, known as the “Sunshine City” with approximately 360 days of sunshine a year, to promote the conservation of energy and natural resources, which is a legitimate and worthy function of the City. The provisions of this ordinance are intended to decrease dependence upon nonrenewable energy sources by encouraging and, in some instances, requiring the installation of devices, structures, or materials for the conservation of energy on certain structures within the City; and

WHEREAS, the City of Tucson has been chosen as a 2007 Solar America City by the Department of Energy in recognition of Tucson’s history of many years of solar energy development experience and as part of the Solar America Cities grant and the Tucson Solar Initiative is to increase solar installations in the City; and

WHEREAS, the City of Tucson has mandated that city staff follow the U.S. Mayor’s Climate Protection Agreement of the United Nations Urban Environmental Accords and the Kyoto Accords as guidelines when developing city policy and to reduce the consumption of fossil fuels by 2030; and

WHEREAS, a solar water heating system offsets approximately 3000 kilowatt hours (kwh) per year, preventing 5760 pounds of Carbon Dioxide (CO2), 11 pounds of Nitrogen Oxides (NOx), 19 pounds of Sulfur Dioxide (SO2) being produced which results in a reduction of greenhouse gases, acid rain, and smog, and 1500 gallons of water (H20) from being consumed;
NOW, THEREFORE, BE IT ORDAINED BY THE MAYOR AND COUNCIL OF THE CITY OF TUCSON, ARIZONA, AS FOLLOWS:

SECTION 1. That this ordinance shall be known and referred to as the "Residential Solar Readiness Ordinance."

SECTION 2. The Director of Development Services is authorized to adopt appropriate rules, regulations, and Development Standards necessary to implement the provisions of Sections 3 and 4.

SECTION 3. All new single family and duplex residential dwelling units shall include an acceptable method to allow for later installation of a system which utilizes solar energy as the primary means of heating domestic potable water. This section shall become effective upon approval of the new standards.

SECTION 4. All new single family and duplex residential dwelling units shall include an acceptable method to allow for later installation of a system which utilizes solar energy as a means of providing electrical power. This section shall become effective upon approval of the new standards.

SECTION 5. The requirements of this ordinance may be modified or waived when it can be satisfactorily demonstrated to the Building Official that compliance with these regulations is impractical due to such issues as shading, building orientation, construction constraints, or configuration of the parcel.

SECTION 6. If any of the provisions of this ordinance or the application thereof to any person or circumstance is invalid, the invalidity shall not affect other provisions or applications of this ordinance which may give effect without the invalid provision or circumstance, and to the end the provisions of this ordinance are severable.
SECTION 7. The various City officers and employees are authorized and directed to perform all acts necessary or desirable to give effect to this ordinance, including, but not limited to, providing an instructional pamphlet setting forth in plain language the requirements of this ordinance.

SECTION 8. WHEREAS, it is necessary for the preservation of the peace, health and safety of the City of Tucson that this ordinance becomes immediately effective, an emergency is hereby declared to exist and this ordinance shall be effective immediately upon its passage and adoption.

PASSED, ADOPTED AND APPROVED BY THE MAYOR AND COUNCIL OF THE CITY OF TUCSON, ARIZONA.

ATTEST:

CITY CLERK

APPROVED TO FORM:

CITY ATTORNEY

MAYOR

REVIEWED BY:

CITY MANAGER

LK
5/29/2008 9:32 AM