

1 **CITY OF SANTA FE, NEW MEXICO**

2 **RESOLUTION NO. 2011-17**

3 **INTRODUCED BY:**

4
5 **Councilor Calvert**
6 **Councilor Romero**

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10 **A RESOLUTION**

11 **DIRECTING STAFF TO PREPARE REVISIONS TO THE CITY'S LONG RANGE**
12 **WATER SUPPLY PLAN FOR THE GOVERNING BODY'S REVIEW WITH A**
13 **SPECIFIC EMPHASIS ON CLIMATE CHANGE.**

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15 **WHEREAS**, the Governing Body approved Resolution No. 2008-80 adopting the city's
16 Long Range Water Supply Plan (Water Plan) in order to secure a reliable and sustainable water
17 supply for the city's residents and water customers and to chart the ways in which the city can
18 meet its water needs for the next forty years through optimizing existing supplies and providing
19 for new supplies; and

20 **WHEREAS**, the Water Plan was developed with guidance from the Governing Body,
21 various city committees and commissions, and input from the Santa Fe community; and

22 **WHEREAS**, the Water Plan identified the following eight policies as the guiding
23 principles for the city's water supply: a) enhance Santa Fe's state-of-the-art conservation
24 program, b) acquire necessary water and environmental permits for the city's future needs, c) use
25 groundwater sustainably, d) optimize the use of treated effluent, e) optimize existing water supply

1 sources, f) apply water use restrictions during drought and emergencies, g) maintain a living
2 Santa Fe River, and h) monitor, adapt and cooperate; and

3 **WHEREAS**, portions of the Water Plan were developed based upon information that
4 merits revisiting; and

5 **WHEREAS**, impacts from climate change on water resources in the Southwest are
6 becoming better understood than when the Water Plan was first conceived; and

7 **WHEREAS**, the Intergovernmental Panel on Climate Change (IPCC) concludes that
8 climate change will strain many of North America's water resources, increasing the competition
9 for water; and

10 **WHEREAS**, a 2007 publication from the University of New Mexico and New Mexico
11 State University, *Impacts of Global Warming on New Mexico's Water Resources*, lists potential
12 water resource results from climate change: a relative shift from snow to rain; less snowpack;
13 earlier snowmelt; more water lost to evaporation; earlier peak streamflows; and reduced total
14 streamflows (between 5-12% by 2030 and 8-33% by 2080);

15 **WHEREAS**, the same publication referenced above identified the water resources
16 changes in New Mexico are likely to result in: shrinking water supplies; greater competition for
17 water; transfers from agricultural to urban uses; substantial economic losses; and losses to
18 wildlife and cultural values; and

19 **WHEREAS**, changes in timing and magnitude of precipitation events can have impacts
20 on water availability on the Santa Fe River, the Rio Grande, and the San Juan River and require
21 reconsidering flood management practices in the Santa Fe River Upper Watershed; and

22 **WHEREAS**, increased surface temperatures may result in a longer growing season and
23 increase Santa Fe's water demand; and,

24 **WHEREAS**, implementation of adaptation measures, such as water conservation, use of
25 markets to allocate water, increasing storage capacity, and the application of appropriate

1 management practices, will increase the city's resiliency and reduce its vulnerability to the
2 impacts of climate change on water resources; and

3 **WHEREAS**, the Governing Body desires to update the Water Plan with specific
4 considerations of future climate change impacts on the reliability and sustainability of the city's
5 current and future water supplies.

6 **NOW, THEREFORE, BE IT RESOLVED BY THE GOVERNING BODY OF THE**
7 **CITY OF SANTA FE** that staff is directed to assess the impacts of potential climate change
8 scenarios on the city's water supplies. The assessment shall also identify potential mitigation and
9 adaptation measures, and be presented for review to the Public Utilities Committee.

10 **AND BE IT FURTHER RESOLVED** that staff is directed to prepare revisions to the
11 city's Long Range Water Supply Plan for the Governing Body's review and approval in order to
12 consider, at a minimum, the following issues as they relate to climate change:

- 13 o Existing reservoir storage capacity,
- 14 o Additional above and below ground water storage options both on the Santa Fe River
15 and the Rio Grande-Rio Chama system,
- 16 o Water conservation,
- 17 o The living Santa Fe River initiative,
- 18 o Treated effluent reuse,
- 19 o Acquisition of water rights, and
- 20 o Stormwater control and use.

21 **AND BE IT FURTHER RESOLVED** that in order to revise the Water Plan, staff is
22 directed to update the city's dynamic systems model (WaterMAPS) with climate change
23 scenarios to understand the resiliency and potential vulnerability of the city's water supplies.

24 **AND BE IT FURTHER RESOLVED** that the draft revisions include a plan for
25 educating the public on the potential local impacts of climate change on the city's water supplies.

