§ 49-221. Water quality standards in general

- A. The director shall adopt, by rule, water quality standards for all navigable waters and for all waters in all aquifers to preserve and protect the quality of those waters for all present and reasonably foreseeable future uses.
- B. The director may adopt, by rule, water quality standards for waters of the state other than those described in subsection A of this section, including standards for the use of water pumped from an aquifer that does not meet the standards adopted pursuant to section 49-223, subsections A and B and that is put to a beneficial use other than drinking water. These standards may include standards for the use of water pumped as part of a remedial action. In adopting such standards, the director shall consider the economic, social and environmental costs and benefits that would result from the adoption of a water quality standard at a particular level or for a particular water category.
- C. In setting standards pursuant to subsection A or B of this section, the director shall consider, but not be limited to, the following:
- 1. The protection of the public health and the environment.
- 2. The uses that have been made, are being made or with reasonable probability may be made of these waters.
- 3. The provisions and requirements of the clean water act and safe drinking water act and the regulations adopted pursuant to those acts.
- 4. The degree to which standards for one category of waters could cause violations of standards for other, hydrologically connected, water categories.
- 5. Guidelines, action levels or numerical criteria adopted or recommended by the United States environmental protection agency or any other federal agency.
- 6. Any unique physical, biological or chemical properties of the waters.
- D. Water quality standards shall be expressed in terms of the uses to be protected and, if adequate information exists to do so, numerical limitations or parameters, in addition to any narrative standards that the director deems appropriate.
- E. The director may adopt by rule water quality standards for the direct reuse of reclaimed water. In establishing these standards , the director shall consider the following:



- 1. The protection of public health and the environment.
- 2. The uses that are being made or may be made of the reclaimed water.
- 3. The degree to which standards for the direct reuse of reclaimed water may cause violations of water quality standards for other hydrologically connected water categories.
- F. If the director proposes to adopt water quality standards for agricultural water, the director shall consult, cooperate, collaborate and, if necessary, enter into interagency agreements and memoranda of understanding with the Arizona department of agriculture relating to its administration, pursuant to title 3, chapter 3, article 4.1, of this state's authority relating to agricultural water under the United States food and drug administration produce safety rule (21 Code of Federal Regulations part 112, subpart E) and any other federal produce safety regulation, order or guideline or other requirement adopted pursuant to the FDA food safety modernization act (P.L. 111-353; 21 United States Code sections 2201 through 2252). For the purposes of this subsection:
- 1. "Agricultural water":
- (a) Means water that is used in a covered activity on produce where water is intended to, or is likely to, contact produce or food contact surfaces.
- (b) Includes all of the following:
- (i) Water used in growing activities, including irrigation water, water used for preparing crop sprays and water used for growing sprouts.
- (ii) Water used in harvesting, packing and holding activities, including water used for washing or cooling harvested produce and water used for preventing dehydration of produce.
- 2. "Covered activity" means growing, harvesting, packing or holding produce. Covered activity includes processing produce to the extent that the activity is within the meaning of farm as defined in section 3-525.
- 3. "Harvesting" has the same meaning prescribed in section 3-525.
- 4. "Holding" has the same meaning prescribed in section 3-525.
- 5. "Packing" has the same meaning prescribed in section 3-525.
- 6. "Produce" has the same meaning prescribed in section 3-525.

(Amended by L. 2018, ch. 48,s. 46, eff. 8/3/2018.)



§ 49-222. Water quality standards for navigable waters

A. Standards for the quality of navigable waters shall assure water quality, if attainable, which provides for protecting the public health and welfare, and shall enhance the quality of water taking into consideration its use and value for public water supplies, the propagation of fish and wildlife and recreational, agricultural, industrial and other purposes including navigation.

B. Not later than January 1, 1990, the director shall adopt standards for the quality of all navigable waters which establish numeric limitations on the concentrations of each of the toxic pollutants listed by the administrator pursuant to section 307 of the clean water act (33 United States Code section 1317).

C. In setting numeric standards for the quality of navigable waters, the director may consider the effect of local water quality characteristics on the toxicity of specific pollutants and the varying sensitivities of local affected aquatic populations to such pollutants, and the extent to which the natural flow of the stream is intermittent or ephemeral, as a result of which the instream flow consists mostly of treated wastewater effluent, except that such standards shall not, in any event, be inconsistent with the clean water act. In applying such standards the director may establish appropriate mixing zones.



§ 49-223. Aquifer water quality standards

A. Primary drinking water maximum contaminant levels established by the administrator before August 13, 1986 are adopted as drinking water aquifer water quality standards. The director may only adopt additional aguifer water quality standards by rule. Within one year after the administrator establishes additional primary drinking water maximum contaminant levels, the director shall open a rule making docket pursuant to section 41-1021 for adoption of those maximum contaminant levels as drinking water aquifer water quality standards. If substantial opposition is demonstrated in the rule making docket regarding a particular constituent, the director may adopt for that constituent the maximum contaminant level as a drinking water aguifer water quality standard upon making a finding that this level is appropriate for adoption in Arizona as an aquifer water quality standard. In making this finding, the director shall consider whether the assumptions about technologies, costs, sampling and analytical methodologies and public health risk reduction used by the administrator in developing and implementing the maximum contaminant level are appropriate for establishing a drinking water aguifer water quality standard. For purposes of this subsection "substantial opposition" means information submitted to the director that explains with reasonable specificity why the maximum contaminant level is not appropriate as an aquifer water quality standard.

B. The director may adopt by rule numeric drinking water aquifer water quality standards for pollutants for which the administrator has not established primary drinking water maximum contaminant levels or for which a maximum contaminant level has been established but the director has determined it to be inappropriate as an aquifer water quality standard pursuant to subsection A of this section. These standards shall be based on the protection of human health. In establishing numeric drinking water aquifer water quality standards, the director shall rely on technical protocols appropriate for the development of aquifer water quality standards and shall base the standards on credible medical and toxicological evidence that has been subjected to peer review.

C. Any person may petition the director to adopt a numeric drinking water aquifer quality standard for any pollutant for which no drinking water aquifer quality standard exists. The director shall grant the petition and institute rule making proceedings adopting a numeric standard as provided under subsection B of this section within one hundred eighty days if the petition shows that the pollutant is a toxic pollutant, that the pollutant has been, or may in the future be, detected in any of the state's drinking water aquifers, and that there exists technical information on which a numeric standard might reasonably be based. Within one year of the commencement of the rule making proceeding, the director shall either adopt a numeric



ARS 49-223 Aquifer water quality standards (Arizona Revised Statutes (2021 Edition))

standard or make and publish a finding that, pursuant to subsection B of this section, the development of a numeric standard is not possible. The decision to not adopt a numeric standard shall, for purposes of judicial review, be treated in the same manner as a rule adopted pursuant to title 41, chapter 6.

- D. For purposes of assessing compliance with each aquifer water quality standard adopted pursuant to this section, the director shall for purposes of articles 3 and 4 of this chapter, and may for purposes of other provisions of this title, identify sampling and analytical protocols appropriate for detecting and measuring the pollutant in the aquifers in the state.
- E. Within one year from the reclassification of an aquifer to a non-drinking water status, pursuant to section 49-224, the director shall adopt water quality standards for that aquifer. For any pollutants which were not the basis for the reclassification, the applicable standard shall be identical with the standard for those pollutants adopted pursuant to subsections A and B of this section. For any pollutants which were the basis for reclassification, the standard shall be sufficient to achieve the purpose for which the aquifer was reclassified but shall minimize unnecessary degradation of the aquifer by taking into consideration the potential long-term uses of the aquifer and the short-term and long-term benefits of the activities resulting in discharges into the aquifer.
- F. The director shall adopt water quality standards for an aquifer for which a petition has been submitted pursuant to section 49-224, subsection D sufficient to achieve the non-drinking water use for which that aquifer was classified, taking into consideration the potential long-term uses of that aquifer and the short-term and long-term benefits of the discharging activities creating that aquifer.
- G. In any action pursuant to this title, aquifer water quality protection provisions, including monitoring requirements, may be imposed only for pollutants for which aquifer water quality standards have been established that are likely to be present in a discharge. Indicator parameters and quality assurance parameters appropriate for such pollutants also may be specified.



§ 49-224. Aquifer identification, classification and reclassification

- A. Not later than June 30, 1987 the director shall, by rule, identify and define the boundaries of all aquifers in this state utilizing, to the maximum extent possible, data available from the department of water resources.
- B. All aquifers in this state identified and defined under subsection A of this section and any other aquifers subsequently discovered, identified and defined shall be classified for drinking water protected use unless the classification is changed in the manner provided in subsection C of this section.
- C. The director, after consulting with the appropriate groundwater users advisory council established pursuant to title 45, chapter 2, article 2 if the aquifer is in an active management area, and a public hearing held pursuant to section 49-208, may change the classification of an aquifer or part of an aquifer for a protected use other than drinking water on making all of the following findings:
- 1. The identified aquifer or part of an aquifer is or will be so hydrologically isolated from other aquifers or other parts of the same aquifer that there is no reasonable probability that poorer quality water from the identified aquifer or part of an aquifer will cause or contribute to a violation of aquifer water quality standards in other aquifers or parts of the same aquifer.
- 2. Water from the identified aquifer or part of an aquifer is not being used as drinking water.
- 3. The short-term and long-term benefits to the public that would result from the degradation of the quality of the water in the identified aquifer or part of an aquifer below standards established pursuant to section 49-223, subsections A and B would significantly outweigh the short-term and long-term costs to the public of such degradation. Benefits and costs to be considered include economic, social and environmental.
- D. Owners or operators of facilities whose discharges are solely responsible for creating an aquifer may petition the director for a classification of the aquifer for a non-drinking water use. The director may, by rule, classify that aquifer for a non-drinking water use upon making the findings prescribed in subsection C, paragraphs 1 and 2 of this section.
- E. The director shall provide for public participation in proceedings under this section pursuant to section 49-208 and shall hold at least one public



ARS 49-224 Aquifer identification, classification and reclassification (Arizona Revised Statutes (2021 Edition))

hearing at a location as near as practicable to the aquifer proposed for reclassification.



§ 49-225. Water quality monitoring

A. The director of environmental quality, with the advice and cooperation of the Arizona department of agriculture and the director of water resources when appropriate, shall conduct ongoing monitoring of the waters of the state including the state's navigable waters and aquifers to detect the presence of new and existing pollutants, determine compliance with applicable water quality standards, determine the effectiveness of best management practices, agricultural best management practices and best available demonstrated control technologies, evaluate the effects of pollutants on public health or the environment and determine water quality trends.

B. The director shall maintain a statewide database of groundwater and soils sampled for pollutants. All agencies shall submit to the director, in a timely manner, the results of any groundwater or soils sampling for pollutants and the results of any groundwater or soils sampling that detect any pollutants.

C. The director shall establish minimum requirements and schedules for groundwater and soils sampling that will ensure precise and accurate results. The requirements shall be distributed to all agencies that conduct sampling. All sampling conducted shall meet the minimum requirements established pursuant to this subsection.

(Amended by L. 2018, ch. 192, s. 3, eff. 8/3/2018.)

