

**COLORADO DEPARTMENT OF PUBLIC HEALTH AND ENVIRONMENT
WATER QUALITY CONTROL COMMISSION**

5 CCR 1002-32

**REGULATION NO. 32
CLASSIFICATIONS AND NUMERIC STANDARDS
FOR
ARKANSAS RIVER BASIN**

**APPENDIX 32-1
Stream Classifications and Water Quality Standards Tables**

Effective ~~12/31/2018~~ 06/30/2019

REGULATION #32 STREAM CLASSIFICATIONS and WATER QUALITY STANDARDS

Upper Arkansas River Basin

8b. Mainstem of Iowa Gulch from a point immediately below the historic upper ASARCO water supply intake at 39.224327, -106.223432 to a point immediately below the headgate of the Paddock #1 Ditch (Iowa Ditch).

COARUA08B	Classifications	Physical and Biological			Metals (ug/L)		
Designation	Agriculture		DM	MWAT		acute	chronic
UP	Aq Life Cold 2	Temperature °C	CS-II	CS-II	Arsenic	340	---
	Recreation E		acute	chronic	Arsenic(T)	---	100
Qualifiers:		D.O. (mg/L)	---	6.0	Cadmium	SSE*	TVS
Other:		D.O. (spawning)	---	7.0	Chromium III	TVS	TVS
Temporary Modification(s):		pH	6.5 - 9.0	---	Chromium III(T)	---	100
Cadmium(chronic) = 1.2		chlorophyll a (mg/m ²)	---	150	Chromium VI	TVS	TVS
Zinc(chronic) = 325		E. Coli (per 100 mL)	---	126	Copper	TVS	TVS
Zinc(acute) = 593					Iron(T)	---	1000
Expiration Date of 6/30/2020					Inorganic (mg/L)	Lead	TVS TVS
			acute	chronic	Manganese	TVS	TVS
*Cadmium(acute) = (1.136672-		Ammonia	TVS	TVS	Mercury(T)	---	0.01
[ln(hardness)*0.041838]*e^(0.9789*ln(hardness)-		Boron	---	0.75	Molybdenum(T)	---	150
3.5146)		Chloride	---	---	Nickel	TVS	TVS
*Uranium(acute) = See 32.5(3) for details.		Chlorine	0.019	0.011	Selenium	TVS	TVS
*Uranium(chronic) = See 32.5(3) for details.		Cyanide	---	---	Silver	TVS	TVS(tr)
		Nitrate	100	---	Uranium	varies*	varies*
		Nitrite	0.05	---	Zinc	TVS	TVS
		Phosphorus	---	0.11			
		Sulfate	---	---			
		Sulfide	---	0.002			

All metals are dissolved unless otherwise noted.
T = total recoverable
t = total
tr = trout

D.O. = dissolved oxygen
DM = daily maximum
MWAT = maximum weekly average temperature
See 32.6 for details on TVS, TVS(tr), WS, temperature standards.

REGULATION #32 STREAM CLASSIFICATIONS and WATER QUALITY STANDARDS Middle Arkansas River Basin

6b. Mainstem of the Saint Charles River from the confluence with Edson Arroyo to the confluence with the Arkansas River.						
COARMA06B	Classifications	Physical and Biological			Metals (ug/L)	
Designation			DM	MWAT		
UP	Agriculture Aq Life Warm 2 Recreation E Water Supply	Temperature °C	varies*	varies*	Arsenic	340 --- 0.02-10 ^A
Qualifiers:		D.O. (mg/L)	---	5.0	Arsenic(T)	---
Other:		pH	6.5 - 9.0	---	Cadmium	TVS TVS
		chlorophyll a (mg/m2)	---	---	Cadmium(T)	5.0 ---
		E. Coli (per 100 mL)	---	126	Chromium III	---
		Inorganic (mg/L)			Chromium III(T)	50 ---
			acute	chronic	Chromium VI	TVS TVS
		Ammonia	TVS	TVS	Copper	TVS TVS
		Boron	---	0.75	Iron	---
		Chloride	---	250	Iron(T)	---
		Chlorine	0.019	0.011	Lead	TVS TVS
		Cyanide	0.005	---	Lead(T)	50 ---
		Nitrate	10	---	Manganese	TVS TVS/WS
		Nitrite	0.05	---	Mercury(T)	---
		Phosphorus	---	---	Molybdenum(T)	---
		Sulfate	---	WS	Nickel	TVS TVS
		Sulfide	---	0.002	Nickel(T)	---
					Selenium	173* 50*
					Silver	TVS TVS
					Uranium	varies* varies*
					Zinc	TVS TVS

Temporary Modification(s):
temperature(DM/MWAT) = current conditions
Expiration Date of 12/31/2018

*Selenium(acute) = See selenium assessment location at 32.6(4).
*Selenium(chronic) = See selenium assessment location at 32.6(4).
*Uranium(acute) = See 32.5(3) for details.
*Uranium(chronic) = See 32.5(3) for details.
*Temperature =
DM=32.6 and MWAT=WS-II from 3/1-11/30
DM=WS-II and MWAT=WS-II from 12/1-2/29

All metals are dissolved unless otherwise noted.
T = total recoverable
t = total
tr = trout

D.O. = dissolved oxygen
DM = daily maximum
MWAT = maximum weekly average temperature
See 32.6 for details on TVS, TVS(tr), WS, temperature standards.

REGULATION #32 STREAM CLASSIFICATIONS and WATER QUALITY STANDARDS

Lower Arkansas River Basin

1a. Mainstem of the Arkansas River from a point immediately above the confluence with Fountain Creek to immediately above the Colorado Canal headgate near Avondale.							
COARLA01A	Classifications	Physical and Biological			Metals (ug/L)		
Designation	Agriculture		DM	MWAT		acute	chronic
UP	Aq Life Warm 2	Temperature °C	varies*	varies*	Arsenic	340	---
	Recreation E		acute	chronic	Arsenic(T)	---	0.02-10 ^A
	Water Supply	D.O. (mg/L)	---	5.0	Cadmium	TVS	TVS
Qualifiers:		pH	6.5 - 9.0	---	Cadmium(T)	5.0	---
Other:		chlorophyll a (mg/m2)	---	---	Chromium III	---	TVS
Temporary Modification(s):		E. Coli (per 100 mL)	---	126	Chromium III(T)	50	---
Selenium(ac/ch) = existing quality		Inorganic (mg/L)			Chromium VI	TVS	TVS
Sulfate(chronic) = existing quality			acute	chronic	Copper	TVS	TVS
Expiration Date of 12/31/2018		Ammonia	TVS	TVS	Iron	---	WS
Discharger Specific Variance(s):		Boron	---	0.75	Iron(T)	---	2800
Selenium(acute) = 19.1 µg/L: narrative		Chloride	---	250	Lead	TVS	TVS
Selenium(chronic) = 14.1 µg/L: narrative		Chlorine	0.019	0.011	Lead(T)	50	---
Sulfate(chronic) = 329 mg/L: narrative		Cyanide	0.005	---	Manganese	TVS	TVS/WS
Expiration Date of 12/31/2028		Nitrate	10	---	Mercury(T)	---	0.01
*Uranium(acute) = See 32.5(3) for details.		Nitrite	0.5	---	Molybdenum(T)	---	150
*Uranium(chronic) = See 32.5(3) for details.		Phosphorus	---	---	Nickel	TVS	TVS
*Temperature =		Sulfate	---	329	Nickel(T)	---	100
DM=WS-II and MWAT=WS-II from 1/1-11/30		Sulfide	---	0.002	Selenium	19.1	14.1
DM= 21.5 and MWAT=20.7 from 12/1-12/31					Silver	TVS	TVS
Variance: Selenium = see 32.6(6)(c) for details on variance for City of Pueblo.					Uranium	varies	varies*
*Variance: Sulfate = see 32.6(6)(c) for details on variance for City of Pueblo.					Zinc	TVS	TVS

All metals are dissolved unless otherwise noted.
T = total recoverable
t = total
tr = trout

D.O. = dissolved oxygen
DM = daily maximum
MWAT = maximum weekly average temperature
See 32.6 for details on TVS, TVS(tr), WS, temperature standards.