COGCC OIL AND GAS FIELD SCOUT CARD

Date	04/18/2016
Document No.	2056112

FIELD NAME	**BALDY CREEK**
FIELD NUMBER	**5180**

LOCATION

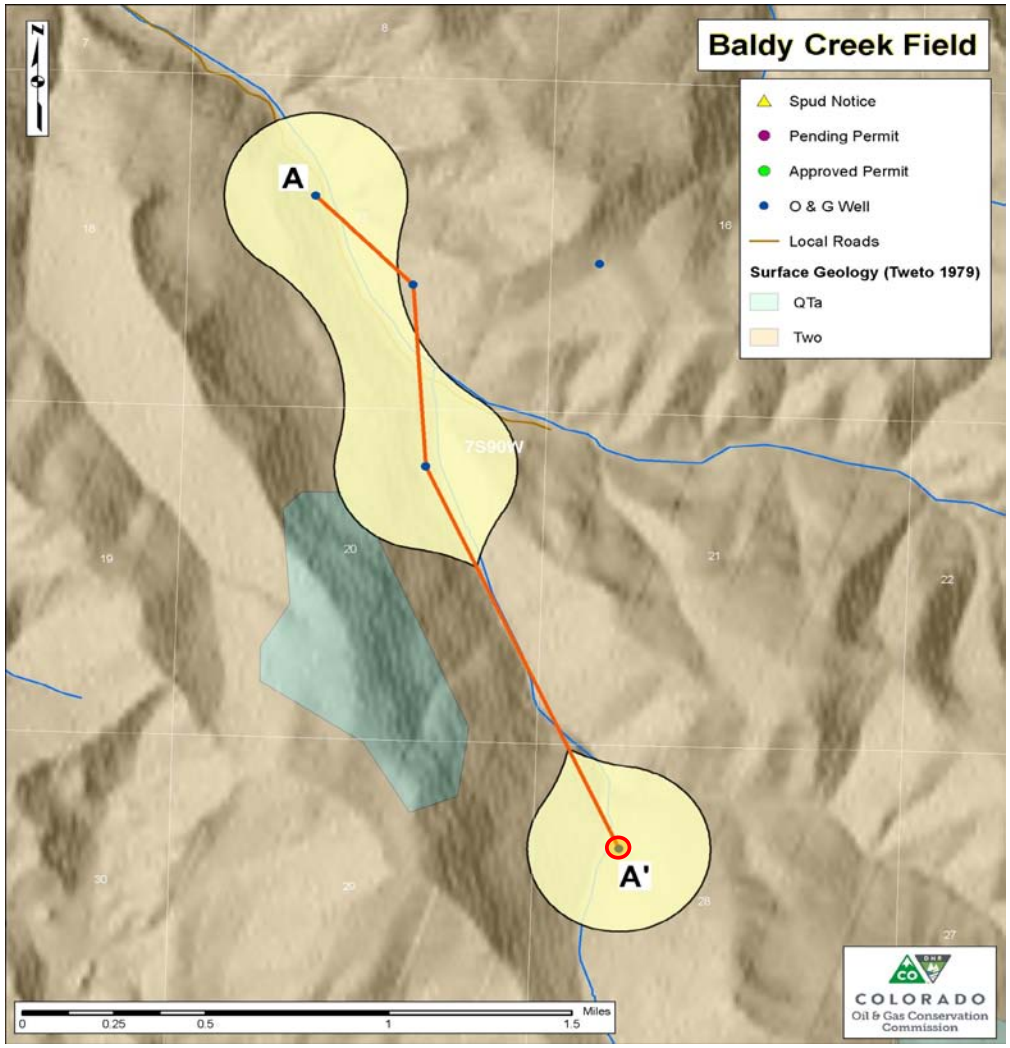
Basin	Piceance
Township(s)	7S
Range(s)	90W

SURFACE GEOLOGY

Surface Geology consists of isolated areas of alluvium underlain by the Wasatch Formation.

GEOLOGIC STRUCTURE

None within the field boundaries on COGCC's 250K GIS Geology layer. A northwest-southeast trending syncline is present east of the field, and a northwest-southeast trending, southwesterly-dipping monocline (the Grand Hogback Monocline along the northeastern edge of the basin) is present further to the north and east.



Type Log Well

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BALDY CREEK #5180

STRATIGRAPHY				A - Northwest			A' - Southeast
			API Number =>	045-06175	045-05056	045-06263	045-06280
			Surface Elevation =>	7,924	8,001	8,233	8,795
All depths are measured depths			Well Type =>	Vertical	Vertical	Vertical	Vertical
Group	Formation	Interval/Member	Isolation Concern	Log Top	Log Top	Log Top	Log Top
	Alluvium		Water		0		
	Wasatch	Upper	Shallow Water	0	140	0	0
	Wasatch	G-Sand*	None	2,151/2,312*	2,150/2,294*	2,004/2,182*	1,752/1,980*
	Wasatch	Fort Union*	None	2,630*	2,593*	2,391*	2,304*
	Wasatch	Middle	None				
	Wasatch	Lower*	Water	4,490*	4,400*	4,260*	4,080*
Mesaverde	Williams Fork	Ohio Creek	Water	4,752*	4,715*	4,560*	4,470*
Mesaverde	Williams Fork	U. Mesaverde	Water	5,107*	5,055*	4,940*	4,762*
Mesaverde	Williams Fork	Top of Gas	Gas				
Mesaverde	Williams Fork	Cameo	Gas	8,900**			8,070
Mesaverde	Iles	Rollins	Gas	9,125	9,060*	8,960*	8,885*
	Mancos Tongue		None	9,355	9,355*	9,240*	9,253*
Mesaverde	Iles	Cozzette	Gas	9,800	9,726*	9,652	9,563
Mesaverde	Iles	Corcoran	Gas	10,042	9,950*	9,882	9,791
	Mancos		Possible Gas	10,220	10,140	10,200*	10,110*
	Niobrara		Possible Gas				

Annotated Type Log for 045-06280: COGCC Document Number 2056081

Stippled cells indicate that the respective log top was not apparent on logs or the top may be covered by a shallower casing string above the logged interval. "Middle Wasatch" is an interval that may include multiple formation members, and therefore, log tops are not presented for the Middle Wasatch.

** COGCC log picks (Wasatch G-Sand [top of upper and lower intervals] and Fort Union are not commonly recognized by operators in this field; "Lower" Wasatch, as shown herein for water isolation, is not recognized in geologic literature)*

*** Tops for Cameo and below are sample tops reported on the Geologic Report for 045-06175, COGCC Document No. 605310.*

WATER RESOURCE ISOLATION

Alluvium, Upper Wasatch (weathered portion in which water supply wells are screened), Lower Wasatch, Ohio Creek, and Upper Mesaverde
The deepest water well in the vicinity of the field is 290' (likely Wasatch)

PRODUCING ZONE ISOLATION

Primary Objectives: Iles Formation of Mesaverde Group (Rollins, Cozzette, and Corcoran)

UNDERGROUND INJECTION CONTROL

None in this field.

COMMISSION ORDER SUMMARY (Significant Engineering and Spacing Issues)

None for this field.

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HISTORIC WELL CONSTRUCTION

Surface casing setting depths are typically about 1,000'. Production casing generally terminates in the Mancos Formation. Production casing cement may be limited to coverage of the producing intervals, and coverage may be lacking across parts of the Mesaverde Group and Wasatch Formation.

NEW WELL CONSTRUCTION (effective 04/18/2016)

Minimum surface casing of 10% TVD required for well control and to cover water resources in the upper interval of the Wasatch Formation. Full cement coverage of the Mesaverde Group and Ohio Creek is required in the Piceance Basin through 2015. New Standards require cementing intermediate (if used) or production casing at least 500' above Lower Wasatch sands, as shown on the annotated type log for this field.

PLUGGING OBJECTIVES

Plug(s) above Mancos and other deeper formations (if penetrated) to address potential future horizontal wells; plug above Mesaverde Group completions; plug above Ohio Creek and across Lower Wasatch (squeeze to 500' above Lower Wasatch if no annular cement coverage); stray gas isolation squeezes (if no annular cement) or in-casing stabilization plugs (if annular cement present) at 3,000-foot intervals if plugs are not already planned in those intervals as described above; surface casing shoe plug and surface plug.

NOTES

Detailed geologic description of formations, gas shows, and water flows in COGCC Document No. 605310, pp 14-17. Stray gas shows noted in Wasatch, and water flows noted in Ohio Creek.
Outside of Bradenhead Monitoring Area, but operator bradenhead monitoring is recommended (no specific reporting requirement).