MONTEREY PENINSULA
WATER MANAGEMENT DISTRICT

5 HARRIS COURT, BLDG. G
POST OFFICE BOX 85
MONTEREY, CA 93942-0085 • (831) 658-5600
FAX (831) 644-9560 • http://www.mpwmd.dst.ca.us

SEASIDE BASIN WATERMASTER MEMORANDUM 2012-02

Date: **August 8, 2012**
To: **Seaside Basin Watermaster**
From: **Jonathan Lear, PG, CHg, Senior Hydrogeologist**

Subject: **Summary of Seaside Groundwater Basin Cross-Aquifer Contamination Wells Investigation Process and Conclusions**

Purpose and Scope

The Monterey Peninsula Water Management District (MPWMD) was retained to evaluate Seaside Groundwater Basin wells for contamination potential between two primary aquifers: the confined Santa Margarita aquifer and unconfined Paso Robles aquifer. MPWMD's evaluation was also to include evaluation of data to assess the potential for contamination due to inadequate well seals. This analysis compiled well log data from multiple sources into a single database, thus facilitating the ability to identify wells that may pose contamination risks based on screened intervals, age, construction material, and current status (e.g., abandoned).

The Seaside Groundwater Basin is subdivided into four distinct subareas: Northern Coastal, Southern Coastal, Northern Inland, and Laguna Seca (Southern Inland). Although the scope of work pertained only to analysis of wells within the Coastal subareas, efficiency in the data work flow allowed inclusion of Inland subareas at no additional cost to the Seaside Watermaster.
This technical memorandum summarizes the procedures employed in the analysis; well statistics including the number and type of wells in the Seaside Basin; assessment of wells regarding potential for surface and/or cross-aquifer contamination; and recommendations regarding potential additional evaluation of specified wells to further enhance this assessment.

Potential Sources of Contamination

The primary sources of cross-contamination between the primary aquifers within the Seaside Groundwater basin include: (1) cross-screened wells (i.e., wells screened in both the Paso Robles and Santa Margarita/Purissima aquifers), (2) poorly-constructed wells (i.e., inadequate seals between aquifers), (3) cracked casing due to age and/or deterioration of construction materials, and (4) abandoned or improperly destroyed wells.

General Stratigraphy and Hydrostratigraphy

The Seaside Groundwater Basin consists of a sedimentary sequence of water-bearing materials that overlie a base of relatively impermeable Miocene age and older crystalline rocks of the Monterey Formation. Even though the Monterey Formation is capable of yielding poor-quality water to wells in many locations, the shales of the Monterey Formation are considered non water-bearing for the purposes of this analysis.

Conformably overlying the Monterey Formation is the Santa Margarita Sandstone, which is commonly referred to as the Santa Margarita aquifer or deep aquifer. This aquifer consists primarily of marine-derived sedimentary sandstone.

The Purissima Formation interfingers with the Santa Margarita Sandstone in the northern portion of the Basin. The location of the transition is poorly understood due to a paucity of wells in the northern part of the project area where this transition may occur. The Purissima Formation is similar to the Santa Margarita Sandstone in that it is a marine deposit consisting of poorly indurated gravels, sands, silts, and silty clay.

The geologic unit unconformably overlying the Purissima Formation and Santa Margarita Sandstone is a Tertiary and Quaternary continental deposit referred to as the Paso Robles or shallow aquifer. This unit consists of a mixture of continentally-derived gravel, sand, silt, and clay sedimentary deposits. The Paso Robles Aquifer is unconfined and overlain by surficial Aromas Sand, which is only saturated along the coastline.

Analysis Performed

Comprehensive Microsoft Access and ArcGIS databases were constructed using data from the following 4 sources: (1) Seaside Watermaster database (SBWM), (2) MPWMD well database, (3) Department of Water Resources (DWR) database, and (4) Fort Ord environmental cleanup database.

The current Seaside Watermaster database (SBWM) well log files were compared with logs available from the other three sources in order to identify records in common and those that should be added into the Watermaster database.

A new database was constructed and populated with available lithology, DWR well number, TIFF (digital record) number, and well construction details including age of well, well type, drilling method, casing materials, estimated capacity, water level, and location data for wells located in each subarea of the basin. Numerous log files contained only a subset of these data.

Locations were determined using a combination of the following sources in order of accuracy: aerial photos (orthorectified) where well locations had been previously field-verified, geographic coordinates, location sketches, log descriptions, APN parcel numbers, TRS (Township – Range – Section) subsections, and TRS sections.

A digital elevation model of the basin was constructed containing well locations, well type, lithology, total depth, and screened intervals based on the compilation from the four available data sources. Seaside Basin groundwater model files were acquired, and model layers containing matrix physical properties and structural geology were incorporated into the digital elevation model.

Cross contamination potential was evaluated based on the digital elevation model and hydrostratigraphy used in the groundwater model.

Wells identified as having a cross-contamination risk were field verified as to their current condition.

Results: Well locations, status, ages, and casing materials

In total, 91 additional well records (an increase of 47%) were identified as part of this investigation and merged with 132 wells from the Seaside Watermaster database and 56 from the MPWMD database, resulting in a total of 279 identified wells records (Table 1). The vast majority of the newly identified wells records (92%) site the potential wells within the Northern and Southern Coastal subareas of the Seaside Basin.

Well locations were sited on maps using a combination of orthorectified aerial photos, coordinates, location sketches, log descriptions, APN parcel numbers, TRS subsections, and TRS sections (Table 2). Uncertainty in location increases from ± 3' for orthorectified and field-verified wells to ± 3,000' for those having only TRS descriptions noting their locations. Roughly 62% of the identified wells are located to a degree of ± 50', 28% are located to a degree of ± 100', and the remaining 10% are located to a degree of ± 600 – 3,000'.

The current status of identified well records within the basin was categorized as destroyed, abandoned, active, inactive, or unknown (Table 3) across a suite of well use types (industrial, irrigation, domestic, etc.). The status of over 52% of the identified well records within the basin are unknown. Roughly 18% of the well records are categorized as active, 10 % are inactive, 15 % are destroyed, and 5% are abandoned. Well status by subarea is shown in Table 4 panels A-E.
Reported well ages (binned by decade) and casing construction materials (PVC, steel, none, and unknown) are shown in Table 5 and Figure 1. The reported ages of 33% of the wells are unknown. The reported casing material of roughly 56% of the wells are unknown, but wells completed prior to 1970 are likely to be cased with steel and are highlighted in Table 5. Steel casings (susceptible to deterioration over time) line 19% of the wells whereas PVC casings line the remaining 25%. Two wells were not cased. Table 6 displays casing construction materials as a function of data source and basin subarea. Table 7 includes the status of the identified wells by subarea. Figure 2 shows locations of all identified well records during this effort.

Conclusions

There are 176 identified wells in the coastal subareas of the basin. Lithological analysis suggests that roughly 60% (104 wells) are screened in multiple aquifers (Table 8 and Figure 3). Of these cross-screened wells, 66 are screened in two aquifers and 38 are screened in three aquifers.

Twenty six of these cross-screened wells are over 40 years old and have steel casing materials which are susceptible to deterioration (Figure 4).

Out of the cross-screened wells and wells identified that may be susceptible to deterioration, 59 wells were scheduled for field investigation (Figure 5). Over August 2011, District staff performed site investigations into the status of these wells. Out of the 59 wells identified for field inspection, 18 are cross-screened over multiple aquifers or penetrate through one aquifer and are screened in a deeper aquifer (Figure 6), 33 were destroyed, and 8 were not locatable.

All of the locatable 18 cross-screened wells are owned maintained by entities named in the Seaside Basin Adjudication Decision. Based on the level of analysis performed in the scope of this study, no obvious structural breakdowns are evident or have been reported. These wells are currently being used as active production wells, backup production wells, and monitoring wells. Because seawater intrusion has not been documented, currently these wells do not pose a threat of providing a migration pathway for saline water across aquifer zones. If seawater intrusion were detected in the locality of any of these wells, the potential of them acting as a conduit for cross-aquifer contamination will need to be revisited.

Tables 8, 9, and 10 were compiled as a product of this investigation and are included in the memo to provide the comprehensive work product.

Recommendations

- During the course of this investigation, several follow up tasks were identified if deemed appropriate, these include;

    1. Verify that seals are correctly installed and structurally sound in multi-completed wells and deep wells.

    2. Video log older deep wells for structural integrity.

    3. Refine model stratigraphy and interface location between the Santa Margarita Sandstone and Purisima Formation.

    4. Add newly located wells to the Seaside Watermaster Database.

It is recommended that items 1 through 3 be tabled at this time as field investigations into well status did not yield potential to obtain and process these types of data. District staff recommends destroyed well records, including lithology, be migrated from the database associated with this investigation to the Watermaster Master Database so that an inclusive set of well records exist in one location.

Figure 1. Well Age and Construction Material.

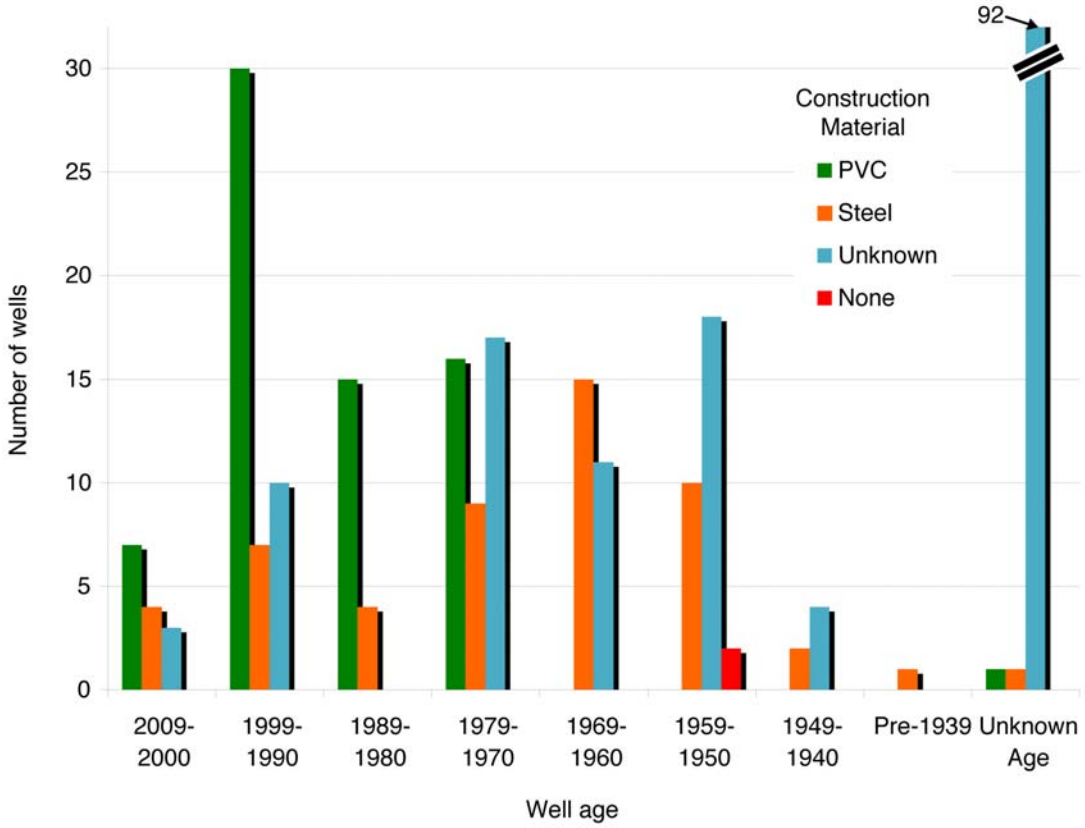


Figure 2. Well Locations as Inferred from Driller Logs.

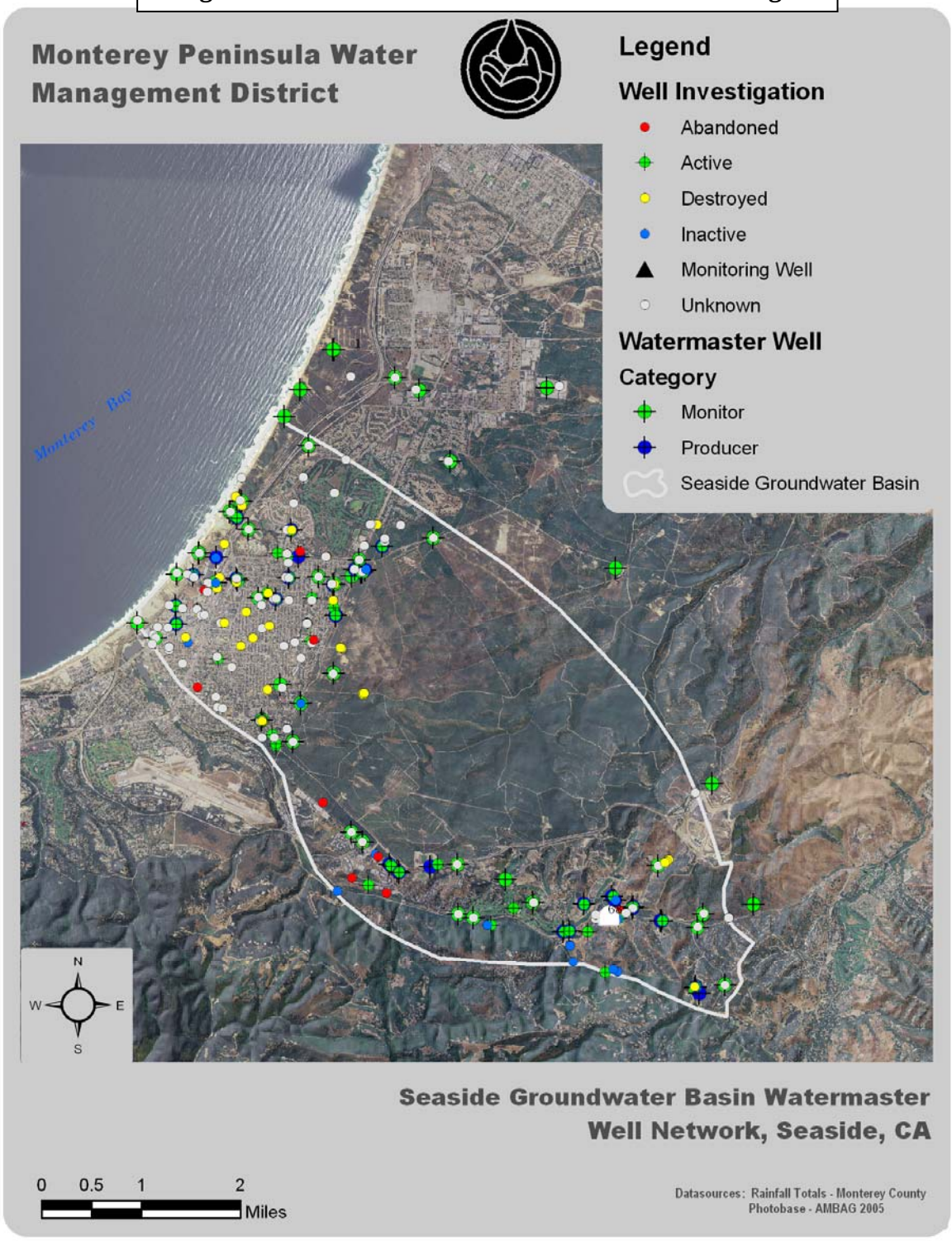


Figure 3. Well Locations and Aquifer Units Screened.

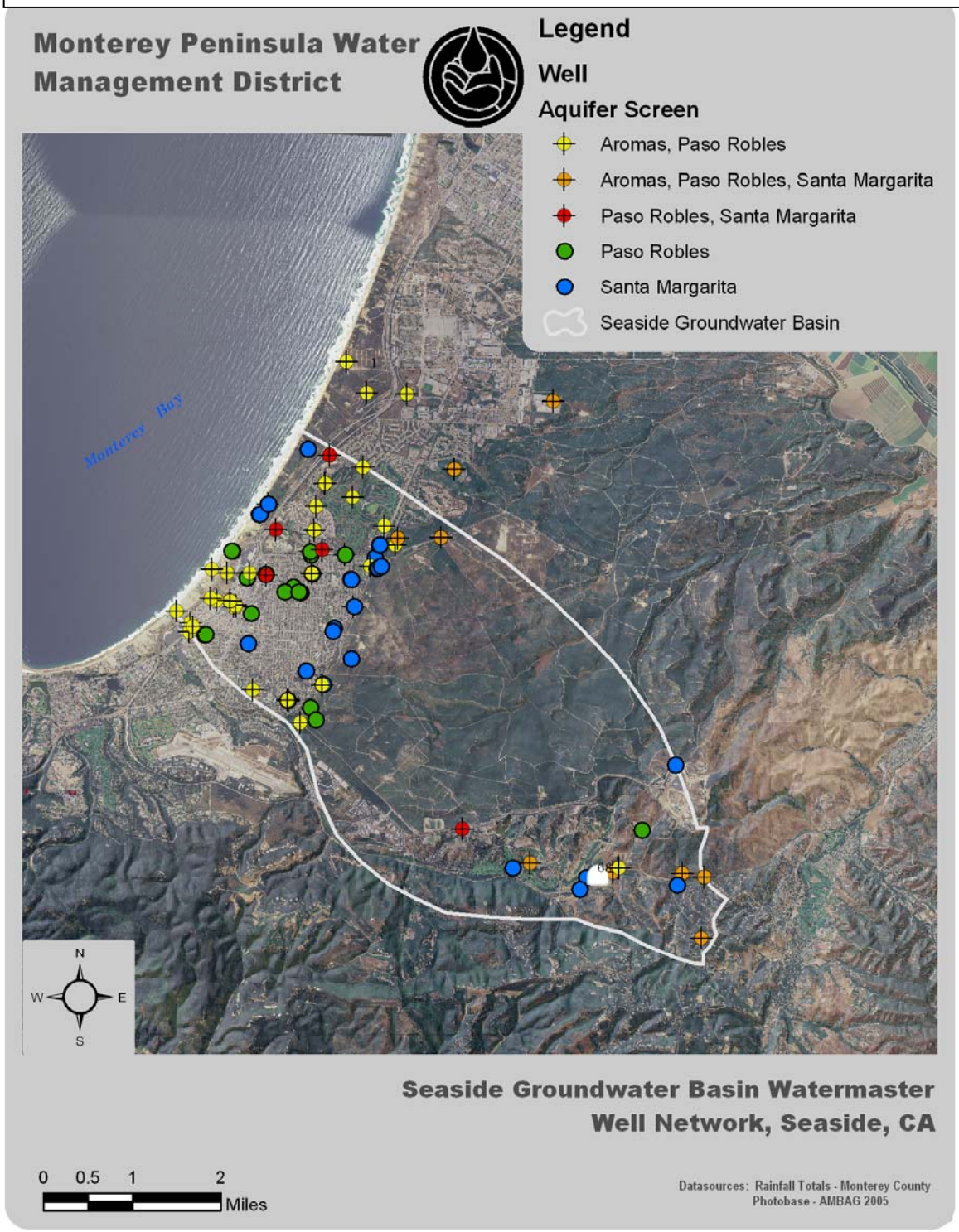


Figure 4. Well Locations Inferred from Drillers Logs and Construction Material.

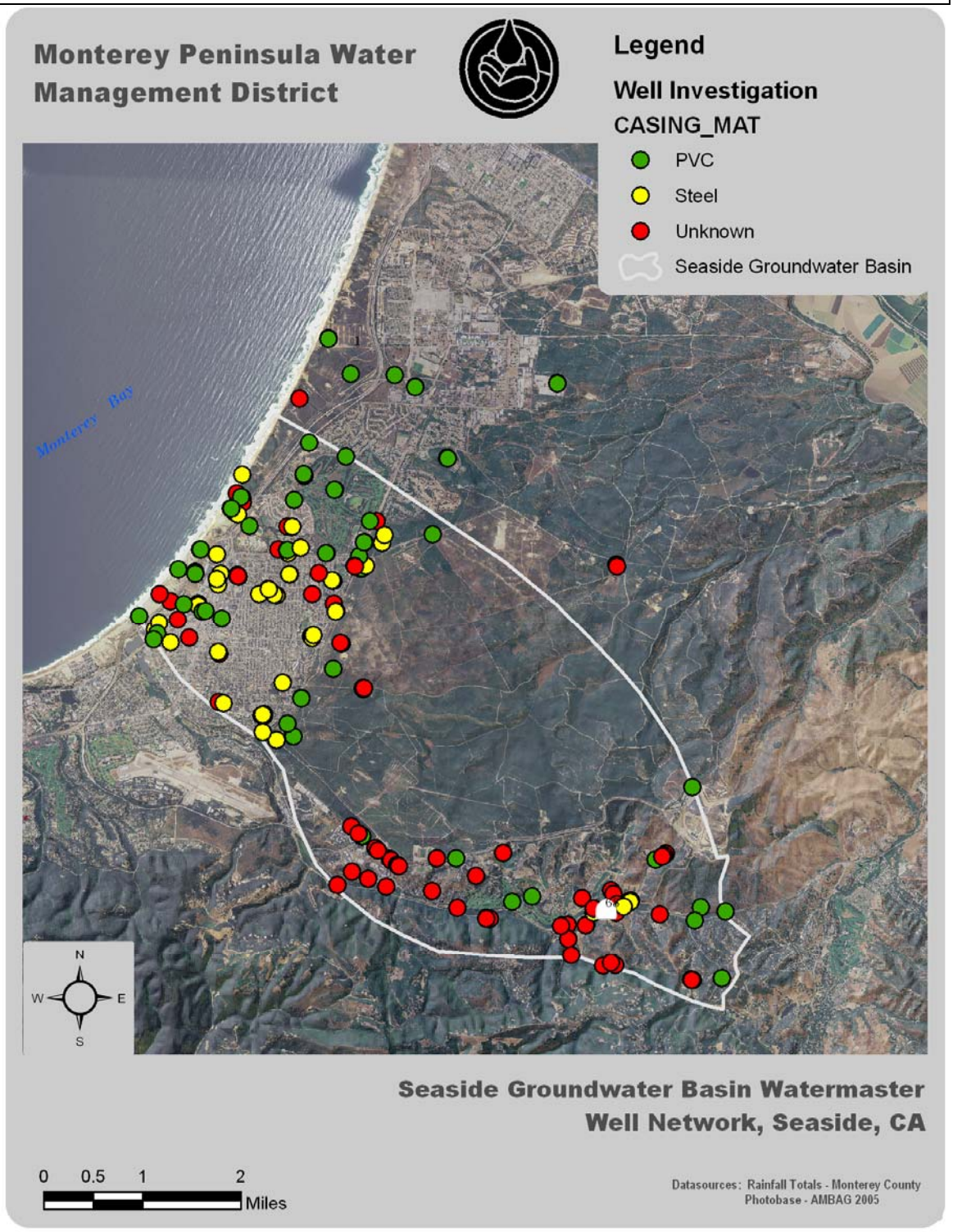
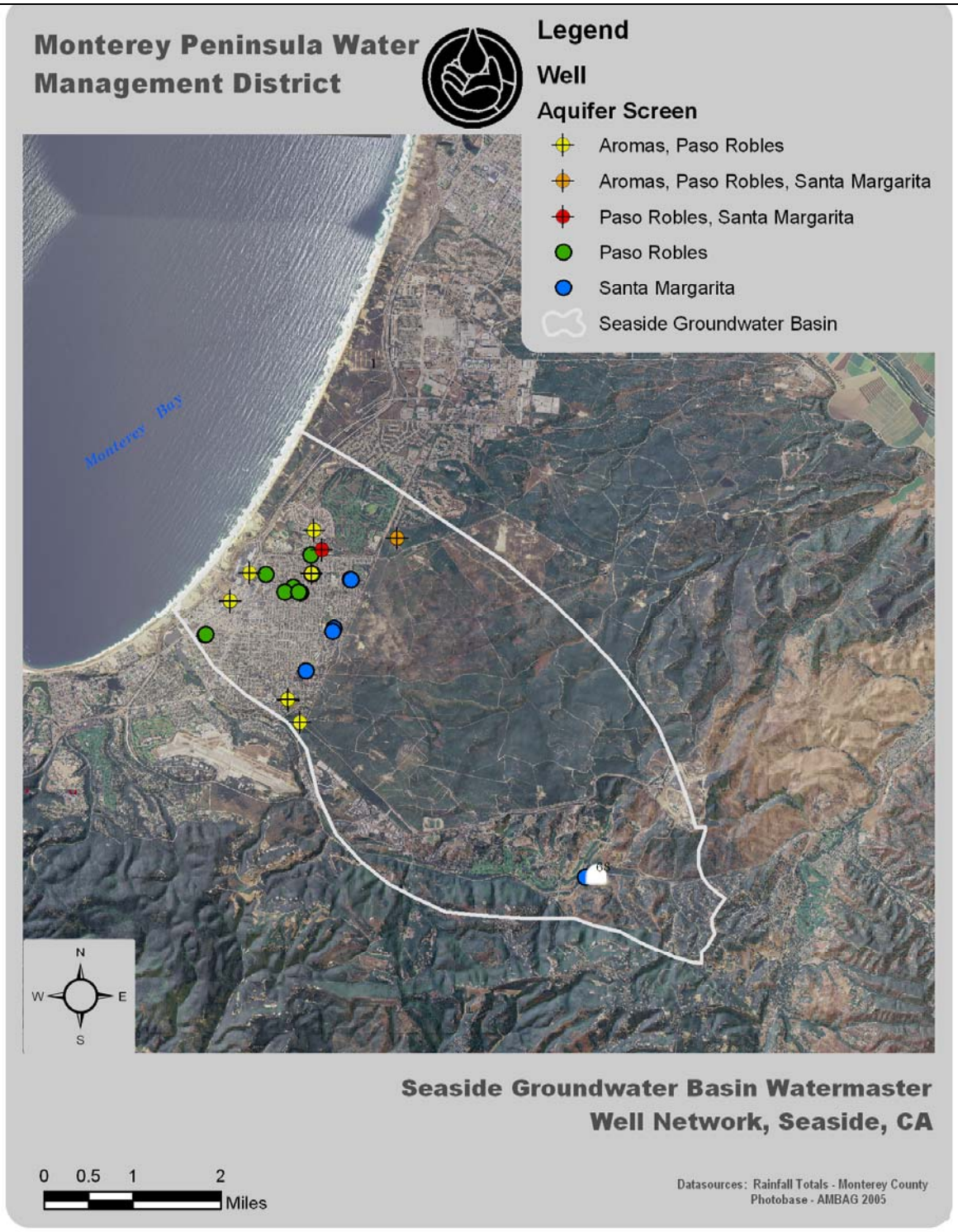


Figure 5. Wells Identified for Location Validation.

Figure 6. Field Verified Cross-Screened or Multiple Aquifer Penetrating Wells.



		Seaside Basin Subarea Well Count					
		N. Coastal	**S. Coastal**	**N. Inland**	**Laguna Seca**	**Outside Boundary**	**Total**
Data Source	SBWM	43	22	10	42	15	132
	MPWMD	24	4	5	23	0	56
	WMI*	41	43	3	3	1	91
	Total	108	69	18	68	16	279

* This investigation. Data sources: DWR, MPWMD, Fort Ord database.

Table 1. Number of wells identified within the Seaside Basin from various sources. Ninety-one additional wells were identified as part of this investigation.

		Location Method						
		Ortho-rectified	**Coord's**	**Loc. Sketch & Log description**	**Log description**	**APN Parcel**	**TRS Subsection**	**TRS**
	Uncertainty **	± 3'	± 10-15'	± 50'	± 50-100'	± 50-100'	± 600'	± 3,000'
Data Source	SBWM	80	6	12	20	3	11	
	MPWMD	25			1	1	1	
	WMI*	30	10	10	48	5	4	12
	Subtotal	135	16	22	69	9	16	12
	Total	279						

* This Investigation. Data sources: DWR, MPWMD, Fort Ord database.

** Uncertainty in location (ft), based on location method. Distances may be significantly greater in rural areas.

Table 2. Number of wells identified and their corresponding location method from various sources. Shaded region highlights poorly-located wells.

Well Use and Status: Seaside Basin						
	Status					
Well Use	DST	ABD	ACT	IA	UNK	**Total #**
Dest/Abd	7				1	**8**
Domestic			2		4	**6**
Industrial	1		2	1	3	**7**
Irrigation			3		5	**8**
Monitoring				4	47	**51**
Municipal	1		4	2	9	**16**
Other	2			2	1	**5**
Public			2		2	**4**
Recharge			1	1	1	**3**
Test	6	3			27	**36**
Cathodic					4	**4**
Unknown	26	9	35	18	43	**131**
Total	**43**	**12**	**49**	**28**	**147**	**279**

Table 3. Well use and status. Status nomenclature is as follows: DST = destroyed, ABD = abandoned, ACT = active, IA = inactive, UNK = status unknown. Well use is derived from well logs.

Panel A: Northern Coastal

	Status					
Well Use	DST	ABD	ACT	IA	UNK	**Total #**
Dst/Abd	3					**3**
Domestic			1			**1**
Industrial			2	1	1	**4**
Irrigation						**0**
Monitoring				1	14	**15**
Municipal	1		3	2	6	**12**
Other	1			1	1	**3**
Public			1			**1**
Recharge			1			**1**
Test	3	1			18	**22**
Cathodic						**0**
Unknown	14	1	11	1	19	**46**
Total:	**22**	**2**	**19**	**6**	**59**	**108**

Panel B: Northern Inland

	Status					
Well Use	DST	ABD	ACT	IA	UNK	**Total #**
Dst/Abd						**0**
Domestic						**0**
Industrial						**0**
Irrigation			1			**1**
Monitoring					5	**5**
Municipal						**0**
Other						**0**
Public						**0**
Recharge				1		**1**
Test					2	**2**
Cathodic						**0**
Unknown	8				1	**9**
Total	**8**	**0**	**1**	**1**	**8**	**18**

Panel C: Southern Coastal

	Status					
Well Use	DST	ABD	ACT	IA	UNK	**Total #**
Dst/Abd	4					**4**
Domestic			1		4	**5**
Industrial	1				2	**3**
Irrigation			1		3	**4**
Monitoring				3	9	**12**
Municipal			1		3	**4**
Other	1					**1**
Public					1	**1**
Recharge					1	**1**
Test	3	1			7	**11**
Cathodic					4	**4**
Unknown	3		6	1	9	**19**
Total	**12**	**1**	**9**	**4**	**43**	**69**

Panel D: Laguna Seca

	Status					
Well Use	DST	ABD	ACT	IA	UNK	**Total #**
Dst/Abd					1	**1**
Domestic						**0**
Industrial						**0**
Irrigation			1		2	**3**
Monitoring					10	**10**
Municipal						**0**
Other				1		**1**
Public			1		1	**2**
Recharge						**0**
Test		1				**1**
Cathodic						**0**
Unknown	1	8	18	16	7	**50**
Total	**1**	**9**	**20**	**17**	**21**	**68**

Panel E: Outside Boundaries

	Status					
Well Use	DST	ABD	ACT	IA	UNK	**Total #**
Dst/Abd						**0**
Domestic						**0**
Industrial						**0**
Irrigation						**0**
Monitoring					9	**9**
Municipal						**0**
Other						**0**
Public						**0**
Recharge						**0**
Test						**0**
Cathodic						**0**
Unknown					7	**7**
Total	**0**	**0**	**0**	**0**	**16**	**16**

Table 4. Well use and status for Seaside Basin Subareas (panels A-E). Status nomenclature is as follows: DST = destroyed, ABD = abandoned, ACT = active, IA = inactive, UNK = status unknown. Well use is derived from well logs.

		Casing Material			
		Unknown	None	PVC	Steel
Well Age	2009-2000	3	0	7	4
	1999-1990	10	0	30	7
	1989-1980	0	0	15	4
	1979-1970	17	0	16	9
	1969-1960	11	0	0	15
	1959-1950	18	2	0	10
	1949-1940	4	0	0	2
	Pre-1939	0	0	0	1
	Unknown Age	92	0	1	1
	sub total:	155	2	69	53
	total	279			

Table 5. Number of wells grouped by age (10-year bins) showing casing construction material. Shaded region highlights wells with unknown casing materials that are likely to be steel.

		Seaside Basin Subarea Well Construction Material																
		N. Coastal			S. Coastal			N. Inland			Laguna Seca			OOB				
		PVC	Steel	Unk	PVC	Steel	Unk	None	PVC	Steel	Unkn	PVC	Steel	Unk	PVC	Steel	Unk	Total
Data Source	SBWM	13	20	10	8	5	9		5	2	3	12	3	27	11		4	132
	MPWMD	1	3	1		1	1						1	20				28
	WMI*	10	5	45	7	12	24	2		1	7	1		4	1			119
	Subtotal	24	28	56	15	18	34	2	5	3	10	13	4	51	12	0	4	279
	Total	108			69				18		68				16			

* This Investigation. Data sources: DWR, MPWMD, Fort Ord database.

Table 6. Number of wells within Seaside Basin Subareas showing datasource and casing construction material. Unk = unknown material. Shaded area highlights two uncased wells – one is abandoned and the status of the other is unknown.

		Casing Material																				Total:
		PVC					Steel					Unknown					None						
	Well Status:	ACT	IA	ABD	DST	UNK	ACT	IA	ABD	DST	UNK	ACT	IA	ABD	DST	UNK	ACT	IA	ABD	DST	UNK	
Well Age	2009-2000		1			6	2	1			1				1	2						14
	1999-1990		2			28	4				3	1			8	1						47
	1989-1980	2				13		2			2											19
	1979-1970		1			15		2			7			1	9	7						42
	1969-1960						3			2	10	1		1	4	5			1		1	28
	1959-1950						4	1		2	3				1	17						28
	1949-1940								1		1	2				2						6
	Pre-1939									1												1
	Unknown Age					1					1	30	18	9	14	21						94
	sub total:	2	4	0	0	63	13	6	1	5	28	34	18	11	37	55	0	0	1	0	1	279
	total	69					53					155					2					

Table 7. Number of wells grouped by well age (10-year bins), casing material, and well status. Shaded region highlights wells with unknown casing materials that are likely to be steel.

NAME	Log #	Aquifers Well is Screened in	Steel > 40 yrs old
Bougainville	27	Aromas, Paso Robles	no
CalAm 1961-B	101376	Aromas, Paso Robles	yes
Castaldo	13	Aromas, Paso Robles	yes
CDM MW-1	14	Aromas, Paso Robles	no
CDM MW-2	38	Aromas, Paso Robles	no
CDM MW-3	52	Aromas, Paso Robles	no
CDM MW-4	45	Aromas, Paso Robles	no
Chas Brown	81221	Aromas, Paso Robles	no
City of Sand City Corp. Yard	490449	Aromas, Paso Robles	no
City of Seaside #4	742178	Paso Robles, Santa Margarita	no
Coe Ave.	107527	Aromas, Paso Robles	yes
County Parks No. 1	498010	Aromas, Paso Robles, Santa Margarita	no
Cypress Pacific	748975	Aromas, Paso Robles	no
FO Boring GD-1	26	Aromas, Paso Robles	no
FO Boring GS-1	24	Aromas, Paso Robles	no
FO Boring GS-2	25	Aromas, Paso Robles	no
FO Boring GS-3	19	Aromas, Paso Robles	no
FO Boring GS-4	36	Aromas, Paso Robles	no
FO Boring GS-5	32	Aromas, Paso Robles	no
FO Boring GS-6	28	Aromas, Paso Robles	no
FO Boring GS-7	23	Aromas, Paso Robles	no
FO Test Hole B	31	Aromas, Paso Robles, Santa Margarita	yes
FO-05	107	Aromas, Paso Robles, Santa Margarita	no
FO-08	106	Aromas, Paso Robles, Santa Margarita	no
FO-11	105	Aromas, Paso Robles, Santa Margarita	no
FO6	101	Aromas, Paso Robles, Santa Margarita	no
FORT ORD #7	103	Aromas, Paso Robles, Santa Margarita	no
FORT ORD #9	104	Paso Robles, Santa Margarita	no
Granite Const. Co -1	121102	Aromas, Paso Robles	yes
Granite Const. Co -2	121103	Aromas, Paso Robles	yes
Granite Const. Co -3	121104	Aromas, Paso Robles	yes
Granite Const. Co -4	72030	Aromas, Paso Robles, Santa Margarita	no
KMART	46	Aromas, Paso Robles	no
Love Motors MW-1	480855	Aromas, Paso Robles	no
Love Motors MW-2	480856	Aromas, Paso Robles	no
Love Motors MW-3	480857	Aromas, Paso Robles	no
LS Old #12	461400	Aromas, Paso Robles, Santa Margarita	no
Luzern Replacement	419426	Aromas, Paso Robles	yes
MCPD No. 2	788672	Aromas, Paso Robles	no
Monte No.4	3	Aromas, Paso Robles	no
MPWMD Plumas-1	232078	Aromas, Paso Robles	no
MW-B-22-180	20	Aromas, Paso Robles	no
MW-B-23-180	16	Aromas, Paso Robles	no
MW-BW-08-A	76	Aromas, Paso Robles	no
n/a - Granite Rock	29387	Aromas, Paso Robles	no
Ord Village No. 2	35	Paso Robles, Santa Margarita	yes
PCA_EAST_MULT	338402	Paso Robles, Santa Margarita	no

Table 8. Cross-screened wells.

NAME	Log #	Aquifers Well is Screened in	Steel > 40 yrs old
Playa4	290011	Paso Robles, Santa Margarita	no
Plumas #2	10	Aromas, Paso Robles	yes
Plumas 4	442710	Aromas, Paso Robles	no
Plumas Production	43635	Aromas, Paso Robles	yes
PRT1W	520448	Aromas, Paso Robles	no
Reservoir	701787	Aromas, Paso Robles	no
Righello	360768	Aromas, Paso Robles	no
ROBLEY	111	Aromas, Paso Robles, Santa Margarita	no
Water Pollution Control Plant	114994	Aromas, Paso Robles	yes
Wells Fargo	411362	Aromas, Paso Robles	no
YORK_WEST	112	Paso Robles, Santa Margarita	no

Table 8. (Continued)

Well Name	Location Method	Well Age	Casing Material	Well Use	Status	Subarea	Data Source
Ranches	TRS Centroid	13	PVC	Monitoring	unk	SC	WMI
Chas Brown	TRS Centroid	37	Steel	Domestic	unk	SC	WMI
Central Post Test - B	TRS Centroid	46	unk	Test Well	unk	NI	WMI
Ca. Water&Phone-4	TRS Centroid	53	unk	Test Well	unk	NC	WMI
Ca. Water&Phone-5	TRS Centroid	53	unk	Test Well	unk	NC	WMI
Ca. Water&Phone-6	TRS Centroid	53	unk	Test Well	unk	NC	WMI
Ca. Water&Phone-7	TRS Centroid	53	unk	Test Well	unk	NC	WMI
Ca. Water&Phone-8	TRS Centroid	53	unk	Test Well	unk	NC	WMI
Ca. Water&Phone-1	TRS Centroid	53	unk	Test Well	unk	NC	WMI
Ca. Water&Phone-2	TRS Centroid	53	unk	Test Well	unk	NC	WMI
Ca. Water&Phone-3	TRS Centroid	53	unk	Test Well	unk	NC	WMI
Durksen	TRS Centroid	unk	unk	unk	unk	SC	WMI
FO-05 Deep	TRS Subsection Centroid	19	PVC	Monitoring	unk	OB	SBWM
FO-05 Shallow	TRS Subsection Centroid	19	PVC	Monitoring	unk	OB	SBWM
Del Rey Oaks Test	TRS Subsection Centroid	20	PVC	Test Well	unk	SC	WMI
FO-03 Deep	TRS Subsection Centroid	24	PVC	Monitoring	unk	NI	SBWM
City of Mont. Ryan Ranch Test	TRS Subsection Centroid	32	nd	Test Well	ABD	LS	WMI
CDM MW-4	TRS Subsection Centroid	34	PVC	Monitoring	unk	SC	SBWM
Ciry of Seaside Test No. 5	TRS Subsection Centroid	37	unk	Test Well	unk	SC	WMI
Hot Spring Well	TRS Subsection Centroid	108	Steel	unk	DST	NC	MPWMD
Blue Larkspur	TRS Subsection Centroid	unk	unk	unk	unk	LS	SBWM
LS Driving Range (SCS Deep)	TRS Subsection Centroid	unk	unk	unk	unk	LS	SBWM
Paddock #4	TRS Subsection Centroid	unk	unk	unk	unk	LS	SBWM
SBWM MW-1	TRS Subsection Centroid	unk	unk	unk	unk	OB	SBWM
SBWM MW-2	TRS Subsection Centroid	unk	unk	unk	unk	OB	SBWM
SBWM MW-5d	TRS Subsection Centroid	unk	unk	unk	unk	OB	SBWM
SBWM MW-5s	TRS Subsection Centroid	unk	unk	unk	unk	OB	SBWM
City Dump	TRS Subsection Centroid	unk	Steel	Industrial	unk	NC	WMI

Table 9. Wells located using TRS Centroid or TRS Subsection Centroids.

Well Name	Location Method	Casing Material	Well Age	Data Source	Well Use	Subarea
SUBDIV	air photo	nd	48	SBWM	Unknown	LS
Granite-CAW	air photo	nd	Unknown	SBWM	Unknown	LS
LS1959	air photo	nd	Unknown	WMI	Unknown	LS
LAGUNASEC	air photo	PVC	22	SBWM	Monitoring	LS
ROBLEYN	air photo	PVC	22	SBWM	Monitoring	LS
ROBLEYS	air photo	PVC	22	SBWM	Monitoring	LS
YORK_WEST	air photo	PVC	22	SBWM	Monitoring	LS
FO4EAST	air photo	PVC	22	SBWM	Monitoring	LS
FO4WEST	air photo	PVC	22	SBWM	Monitoring	LS
MCPD No. 2	air photo	Steel	8	SBWM	Domestic	LS
ordterracedee	air photo	nd	Unknown	SBWM	Unknown	NC
ordterracesha	air photo	nd	Unknown	SBWM	Unknown	NC
Fitch MW-1	air photo	PVC	1	SBWM	Monitoring	NC
Fitch MW-2	air photo	PVC	1	SBWM	Monitoring	NC
ASR-MW 1	air photo	PVC	Unknown	SBWM	Monitoring	NC
MW-B-30-180	air photo	nd	36	WMI	Unknown	NC
MW-B-32-180	air photo	nd	Unknown	WMI	Unknown	NC
LS Old #12	air photo, Log description	PVC	13	WMI	Irrigation	LS
FO6DEEP	air photo, Log description	PVC	19	SBWM	Monitoring	LS
FO6SHAL	air photo, Log description	PVC	19	SBWM	Monitoring	LS
SECA_PLAC	air photo, Log description	PVC	22	SBWM	Monitoring	LS
RYAN_RANC	air photo, Log description	PVC	29	SBWM	Monitoring	LS
FORT ORD #9 D	air photo, Log description	PVC	16	SBWM	Monitoring	NC
FORT ORD #9 S	air photo, Log description	PVC	16	SBWM	Monitoring	NC
M. SAND CO. D	air photo, Log description	PVC	20	SBWM	Monitoring	NC
M. SAND CO. S	air photo, Log description	PVC	20	SBWM	Monitoring	NC
PARALTA_TEST_	air photo, Log description	PVC	20	SBWM	Test Well	NC
PCA W Deep	air photo, Log description	PVC	20	SBWM	Monitoring	NC
PCA W Shallow	air photo, Log description	PVC	20	SBWM	Monitoring	NC
PCA_EAST_MULT	air photo, Log description	PVC	20	SBWM	Monitoring	NC

Table 10. Wells with unknown status

Well Name	Location Method	Casing Material	Well Age	Data Source	Well Use	Subarea
FORT ORD #7 D	air photo, Log description	PVC	16	SBWM	Monitoring	NI
FORT ORD #7 S	air photo, Log description	PVC	16	SBWM	Monitoring	NI
FO1DEEP	air photo, Log description	PVC	24	SBWM	Monitoring	NI
FO1SHAL	air photo, Log description	PVC	24	SBWM	Monitoring	NI
PLUMAS_TEST_9	air photo, Log description	PVC	20	SBWM	Monitoring	SC
KMART	air photo, Log description	PVC	34	SBWM	Unknown	SC
SBWM MW-3	Coordinates	nd	3	SBWM	Monitoring	NC
SBWM MW-4	Coordinates	nd	3	SBWM	Monitoring	NC
FO Boring GD-1	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GD-2	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GD-3	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GS-1	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GS-2	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GS-3	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GS-5	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GS-6	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GS-7	Coordinates	PVC	33	WMI	Unknown	NC
FO Boring GS-4	Coordinates	PVC	33	WMI	Unknown	OB
MW-B-22-180	Coordinates	PVC	33	SBWM	Unknown	OB
MW-B-23-180	Coordinates	PVC	33	SBWM	Unknown	OB
City of Seaside Test No. 2	Log desciption, drawing	nd	46	WMI	Test Well	NC
FO-11 Shallow	Log desciption, drawing	PVC	14	SBWM	Monitoring	OB
FO-10 Deep	Log desciption, drawing	PVC	14	SBWM	Monitoring	OB
FO-10 Shallow	Log desciption, drawing	PVC	14	SBWM	Monitoring	OB
FO-08 Shallow	Log desciption, drawing	PVC	16	SBWM	Monitoring	OB
FO-11 Deep	Log desciption, drawing	PVC	14	SBWM	Monitoring	OB
FO-08 Deep	Log desciption, drawing	PVC	16	SBWM	Monitoring	OB
n/a - Granite Rock	Log desciption, drawing	Steel	32	SBWM	Industrial	SC
Cypress Pacific	Log desciption, drawing	PVC	9	SBWM	Domestic	SC
MCPD No. 1	Log desciption	Steel	18	SBWM	Public	LS
Paddock #1	Log description	Steel	38	SBWM	Irrigation	LS
New Cities Land Co.	Log description	nd	Unknown	SBWM	Unknown	LS

Table 10. (continued)

Well Name	Location Method	Casing Material	Well Age	Data Source	Well Use	Subarea
City of Seaside Test No. 4	Log description	nd	37	WMI	Test Well	NC
FO Test Hole A	Log description	nd	46	WMI	Test Well	NC
CalAm Test No. 4	Log description	nd	53	WMI	Test Well	NC
CalAm Test No. 5	Log description	nd	53	WMI	Test Well	NC
CalAm Test No. 6	Log description	nd	53	WMI	Test Well	NC
CalAm Test No. 1	Log description	nd	53	WMI	Test Well	NC
CalAm Test No. 2	Log description	nd	53	WMI	Test Well	NC
G.J. No. 1	Log description	nd	61	WMI	Test Well	NC
Metz No. 1	Log description	nd	65	WMI	Unknown	NC
CDM MW-2	Log description	PVC	7	SBWM	Monitoring	NC
Bougainville	Log description	PVC	36	WMI	Monitoring	NC
Luzern Original	Log description	Steel	44	SBWM	Municipal	NC
Playa No. 1	Log description	Steel	44	SBWM	Municipal	NC
Harding	Log description	Steel	53	WMI	Municipal	NC
Mission Memorial Monitor	Log description	nd	Unknown	SBWM	Unknown	NC
Playa Well	Log description	nd	Unknown	SBWM	Unknown	NC
FO Test Hole C	Log description	nd	46	WMI	Test Well	NI
FO Test Hole B	Log description	Steel	69	WMI	Unknown	NI
CDM MW-1	Log description	PVC	7	SBWM	Monitoring	OB
Dune Well	Log description	nd	52	WMI	Unknown	SC
CalAm Test No. 3	Log description	nd	53	WMI	Test Well	SC
CalAm Test No. 7	Log description	nd	53	WMI	Test Well	SC
CalAm Test No. 8	Log description	nd	53	WMI	Test Well	SC
James Siino	Log description	nd	Unknown	WMI	Unknown	SC
Seaside Sanitary District	Log description	nd	Unknown	WMI	Unknown	SC
CalAm Test No. 6	Log description	none	43	WMI	Test Well	SC
CDM MW-3	Log description	PVC	7	SBWM	Monitoring	SC
MPWMD Plumas-1	Log description	PVC	28	WMI	Recharge	SC
MPWMD Plumas-2	Log description	PVC	28	WMI	Monitoring	SC
Plumas 4	Log description	Steel	14	SBWM	Public	SC
Monte No.4	Log Description	Steel	37	WMI	Unknown	SC
Granite Const. Co -4	Log description	Steel	37	WMI	Industrial	SC

Table 10. (continued)

Well Name	Location Method	Casing Material	Well Age	Data Source	Well Use	Subarea
CalAm-71	Log description	Steel	39	WMI	Municipal	SC
CalAm 1961-B	Log description	Steel	42	WMI	Domestic	SC
Elm Well	Log description	Steel	42	WMI	Municipal	SC
Seaside #1	Log description	Steel	44	WMI	Municipal	SC
Granite Const. Co -1	Log description	Steel	44	WMI	Irrigation	SC
Granite Const. Co -2	Log description	Steel	44	WMI	Irrigation	SC
Granite Const. Co -3	Log description	Steel	44	WMI	Irrigation	SC
Orange	Log description	Steel	54	WMI	Unknown	SC
Hilby MGT	Log description	Steel	57	SBWM	Unknown	SC
Desal Monitor	Log description	nd	Unknown	SBWM	Unknown	SC
City of Seaside #2	Log description	Steel	45	SBWM	Municipal	NC
City of Seaside #1	Log description	Steel	45	SBWM	Municipal	NC
Chiantelli	Log description	Steel	33	WMI	Test Well	SC
Love Motors MW-1	Log description, drawing	nd	17	WMI	Monitoring	SC
PG&E	Log description, drawing	nd	32	WMI	Cathodic Protection	SC
PG&E	Log description, drawing	nd	32	WMI	Cathodic Protection	SC
PG&E	Log description, drawing	nd	32	WMI	Cathodic Protection	SC
PG&E	Log description, drawing	nd	32	WMI	Cathodic Protection	SC
Love Motors MW-2	Log description, drawing	PVC	16	WMI	Monitoring	SC
Love Motors MW-3	Log description, drawing	PVC	16	WMI	Monitoring	SC
PRT1W	APN, Log description	Steel	12	SBWM	Other	NC
Ord Grove #2	APN, Log description	Steel	27	SBWM	Unknown	NC
Cunningham Park	APN centroid	nd	Unknown	WMI	Unknown	NC
Metz Park	APN centroid	nd	Unknown	WMI	Unknown	NC
CalAm W-3917	APN centroid	Steel	27	WMI	Municipal	NC
Wells Fargo	APN centroid	PVC	17	WMI	Monitoring	SC
Righello	APN centroid	PVC	19	SBWM	Domestic	SC
Blue Larkspur	TRS Subsection Centroid	nd	Unknown	SBWM	Unknown	LS
LS Driving Range (SCS Deep)	TRS Subsection Centroid	nd	Unknown	SBWM	Unknown	LS
Paddock #4	TRS Subsection Centroid	nd	Unknown	SBWM	Unknown	LS
FO-03 Deep	TRS Subsection Centroid	PVC	24	SBWM	Monitoring	NI
SBWM MW-1	TRS Subsection Centroid	nd	Unknown	SBWM	Unknown	OB

Table 10. (continued)

Well Name	Location Method	Casing Material	Well Age	Data Source	Well Use	Subarea
SBWM MW-2	TRS Subsection Centroid	nd	Unknown	SBWM	Unknown	OB
SBWM MW-5d	TRS Subsection Centroid	nd	Unknown	SBWM	Unknown	OB
SBWM MW-5s	TRS Subsection Centroid	nd	Unknown	SBWM	Unknown	OB
FO-05 Deep	TRS Subsection Centroid	PVC	19	SBWM	Monitoring	OB
FO-05 Shallow	TRS Subsection Centroid	PVC	19	SBWM	Monitoring	OB
City of Seaside Test No. 5	TRS Subsection Centroid	nd	37	WMI	Test Well	SC
CDM MW-4	TRS Subsection Centroid	PVC	34	SBWM	Monitoring	SC
Del Rey Oaks Test	TRS Subsection Centroid	PVC	20	WMI	Test Well	SC
City Dump	TRS Subsection Centroid	Steel	Unknown	WMI	Industrial	NC
Ca. Water&Phone-4	TRS Centroid	nd	53	WMI	Test Well	NC
Ca. Water&Phone-5	TRS Centroid	nd	53	WMI	Test Well	NC
Ca. Water&Phone-6	TRS Centroid	nd	53	WMI	Test Well	NC
Ca. Water&Phone-7	TRS Centroid	nd	53	WMI	Test Well	NC
Ca. Water&Phone-8	TRS Centroid	nd	53	WMI	Test Well	NC
Ca. Water&Phone-1	TRS Centroid	nd	53	WMI	Test Well	NC
Ca. Water&Phone-2	TRS Centroid	nd	53	WMI	Test Well	NC
Ca. Water&Phone-3	TRS Centroid	nd	53	WMI	Test Well	NC
Central Post Test - B	TRS Centroid	nd	46	WMI	Test Well	NI
Durksen	TRS Centroid	nd	Unknown	WMI	Unknown	SC
Ranches	TRS Centroid	PVC	13	WMI	Monitoring	SC
Chas Brown	TRS Centroid	Steel	37	WMI	Domestic	SC

Table 10. (continued)

Name	Status	Casing	Casing Type	Drill Method	Drill Year	Well Age	Data Source	Well Use	Subarea
64 SEASIDE TEST 1	ACT	nd	nd	nd	UNK	UNK	WMI	Unknown	NC
AMADOR	ACT	nd	nd	nd	UNK	UNK	WMI	Unknown	SC
BayRidge	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Behen/Wayland	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Bishop No. 1	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Bishop No. 2	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Blue Larkspur	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Ca. Water&Phone-1	UNK	nd	nd	Rotary	1957	53	WMI	Test Well	NC
Ca. Water&Phone-2	UNK	nd	nd	Rotary	1957	53	WMI	Test Well	NC
Ca. Water&Phone-3	UNK	nd	nd	Rotary	1957	53	WMI	Test Well	NC
Ca. Water&Phone-4	UNK	nd	nd	Cable	1957	53	WMI	Test Well	NC
Ca. Water&Phone-5	UNK	nd	nd	Cable	1957	53	WMI	Test Well	NC
Ca. Water&Phone-6	UNK	nd	nd	Cable	1957	53	WMI	Test Well	NC
Ca. Water&Phone-7	UNK	nd	nd	Cable	1957	53	WMI	Test Well	NC
Ca. Water&Phone-8	UNK	nd	nd	Cable	1957	53	WMI	Test Well	NC
Calabrese	ACT	nd	nd	nd	1945	65	MPWMD	Domestic	NC
CalAm 1961-B	UNK	Steel	12 gage	Cable	1968	42	WMI	Domestic	SC
CalAm Plumas 2	DST	nd	na	na	UNK	UNK	SBWM	Destroy	SC
CalAm Plumas 3	DST	nd	na	na	UNK	UNK	SBWM	Destroy	SC
CalAm Test No. 1	UNK	nd	nd	Rotary	1957	53	WMI	Test Well	NC
CalAm Test No. 2	UNK	nd	nd	Rotary	1957	53	WMI	Test Well	NC
CalAm Test No. 3	DST	nd	nd	Rotary	1967	43	WMI	Test Well	SC
CalAm Test No. 3	UNK	nd	nd	Rotary	1957	53	WMI	Test Well	SC
CalAm Test No. 4	UNK	nd	nd	Cable?	1957	53	WMI	Test Well	NC
CalAm Test No. 4: Lowell	DST	nd	na	na	UNK	UNK	WMI	Test Well	SC
CalAm Test No. 5	UNK	nd	nd	Cable?	1957	53	WMI	Test Well	NC
CalAm Test No. 5: Flores	DST	nd	na	na	UNK	UNK	WMI	Test Well	NC
CalAm Test No. 6	DST	nd	nd	Rotary	1967	43	WMI	Test Well	SC
CalAm Test No. 6	UNK	nd	nd	Cable?	1957	53	WMI	Test Well	NC
CalAm Test No. 7	UNK	nd	nd	Rotary	1957	53	WMI	Test Well	SC
CalAm Test No. 8	UNK	nd	nd	Rotary	1957	53	WMI	Test Well	SC
Castaldo	ACT	Steel	12 gage	Cable	1952	58	SBWM	Domestic	SC
Central Post Test - B	UNK	nd	nd	Rotary	1964	46	WMI	Test Well	NI
City Dump	UNK	Steel	nd	Dug	UNK	UNK	WMI	Industrial	NC
City of Seaside #1	UNK	Steel	1/4	Rotary, Cable	1965	45	SBWM	Municipal	NC

Table 11. Wells that are likely to be cased in steel and over 40 years old.

Name	Status	Casing	Casing Type	Drill Method	Drill Year	Well Age	Data Source	Well Use	Subarea
City of Seaside #2	UNK	Steel	nd	Rotary	1965	45	SBWM	Municipal	NC
City of Seaside Test No. 1	ABD	nd	na	Rotary	1964	46	WMI	Test Well	NC
City of Seaside Test No. 2	UNK	nd	na	Rotary	1964	46	WMI	Test Well	NC
Coe Ave.	DST	Steel	5/16	Cable	1965	45	SBWM	Municipal	NC
County Parks No. 4?	ACT	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Cunningham Park	UNK	nd	nd	nd	UNK	UNK	WMI	Unknown	NC
Darwin	ACT	Steel	8 gage	Cable	1954	56	SBWM	Municipal	NC
Desal Monitor	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	SC
Dune Well	UNK	nd	nd	nd	1958	52	WMI	Unknown	SC
Durksen	UNK	nd	nd	nd	UNK	UNK	WMI	Unknown	SC
E.O. Neuman	DST	nd	nd	nd	UNK	UNK	WMI	Unknown	SC
East Well	IA	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Elm Well	UNK	Steel	1/4	Rotary	1968	42	WMI	Municipal	SC
Ethel Jackson	DST	nd	nd	nd	UNK	UNK	WMI	Destroy	NC
FO Test Hole A	UNK	nd	nd	nd	1964	46	WMI	Test Well	NC
FO Test Hole B	UNK	Steel	nd	nd	1941	69	WMI	Unknown	NI
FO Test Hole C	UNK	nd	nd	nd	1964	46	WMI	Test Well	NI
Fowler_Snyder	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
G.C. 1	ACT	nd	nd	nd	1965	45	WMI	Unknown	NC
G.J. No. 1	UNK	nd	nd	nd	1949	61	WMI	Test Well	NC
Granite	DST	nd	na	na	UNK	UNK	WMI	Unknown	NC
Granite Const. Co -1	UNK	Steel	16 gage	Rotary Bucket	1966	44	WMI	Irrigation	SC
Granite Const. Co -2	UNK	Steel	16 gage	Rotary Bucket	1966	44	WMI	Irrigation	SC
Granite Const. Co -3	UNK	Steel	16 gage	Rotary Bucket	1966	44	WMI	Irrigation	SC
Granite-CAW	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Harding	UNK	Steel	1/4	Rotary	1957	53	WMI	Municipal	NC
Hilby MGT	UNK	Steel	nd	nd	1953	57	SBWM	Unknown	SC
Hot Spring Well	DST	Steel	nd	Cable	1902	108	MPWMD	Unknown	NC
James Siino	UNK	nd	nd	nd	UNK	UNK	WMI	Unknown	SC
Laguna Seca ABD 1	ABD	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Laguna Seca ABD 2	ABD	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
LaSalle	ACT	Steel	1/4	Rotary	1955	55	MPWMD	Industrial	NC
LaSalle No. 2	DST	Steel	8 gage	Cable	1959	51	SBWM	other	NC
LazyJake	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
LS Driving Range (SCS Deep)	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
LS1959	UNK	nd	nd	nd	UNK	UNK	WMI	Unknown	LS

Table 11. (continued)

Name	Status	Casing	Casing Type	Drill Method	Drill Year	Well Age	Data Source	Well Use	Subarea
LSS new #12	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Luxton	IA	Steel	8 gage	Cable	1959	51	SBWM	other	NC
Luzern Original	UNK	Steel	1/4	Rotary	1966	44	SBWM	Municipal	NC
M9	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Main Gate No. 2	ACT	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Manuel Morton	DST	nd	nd	nd	UNK	UNK	WMI	Unknown	SC
MCPD Dest. 1999	DST	nd	nd	nd	UNK	UNK	SBWM	Unknown	NI
MCPD Dest. 2003	DST	nd	nd	nd	UNK	UNK	SBWM	Unknown	NI
MCPD Dest. 2005	DST	nd	nd	nd	UNK	UNK	SBWM	Unknown	NI
Metz No. 1	UNK	nd	nd	nd	1945	65	WMI	Unknown	NC
Metz Park	UNK	nd	nd	nd	UNK	UNK	WMI	Unknown	NC
Military	ACT	Steel	8 gage	nd	1963	47	SBWM	Industrial	NC
Mission Memorial Monitor	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	NC
Mutual	IA	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
MW-B-32-180	UNK	nd	nd	nd	UNK	UNK	WMI	Unknown	NC
New Cities Land Co.	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
NG1983	ACT	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
NG2	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
NG3	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
NGIA	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Orange	UNK	Steel	10 gage	Cable	1956	54	WMI	Unknown	SC
Ord Grove	ACT	Steel	8 gage	Rotary	1968	42	MPWMD	Municipal	NC
Ord Village No. 2	ABD	Steel	10 gage	nd	1941	69	WMI	Unknown	NC
ORD_GROVE_TES	DST	nd	nd	Rotary	1967	43	SBWM	Test Well	NC
ordterracedee	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	NC
ordterracesha	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	NC
Oscar Veach	DST	nd	nd	nd	UNK	UNK	WMI	Destroy	NC
OV-1	ACT	nd	nd	nd	1941	69	WMI	Unknown	NC
P.C.A.	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	NC
Paddock #4	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Palm Well	DST	nd	nd	nd	UNK	UNK	WMI	Unknown	SC
Pasadera Paddock	ACT	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
PLAYA #02	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	NC
Playa No. 1	UNK	Steel	1/4	Rotary	1966	44	SBWM	Municipal	NC
Playa Test No. 3	DST	nd	nd	nd	1966	44	WMI	Test Well	NC
Playa Well	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	NC

Table 11. (continued)

Name	Status	Casing	Casing Type	Drill Method	Drill Year	Well Age	Data Source	Well Use	Subarea
Playa3	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	NC
Plumas #2	DST	Steel	1/4	Cable	1958	52	SBWM	Other	SC
PLUMAS 03	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	SC
PLUMAS M-02	ACT	nd	nd	nd	UNK	UNK	WMI	Unknown	SC
Plumas Production	ACT	Steel	1/4	Rotary	1958	52	MPWMD	Municipal	SC
Pratt	IA	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Robinette Well	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	SC
RR6 ABD	ABD	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Ryan Ranch #2	ABD	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
RYAN RANCH M7S	ACT	nd	nd	nd	UNK	UNK	WMI	Unknown	LS
RYAN RANCH M8S	ACT	nd	nd	nd	UNK	UNK	WMI	Unknown	LS
Ryan Ranch No. 10	ABD	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Ryan Ranch No. 11	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Ryan Ranch No. 4	ABD	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Ryan Ranch No. 5	ABD	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Ryan Ranch No. 7	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Ryan Ranch No. 8	IA	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Ryan Ranch No. 9	IA	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
SBWM MW-1	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	OB
SBWM MW-2	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	OB
SBWM MW-5d	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	OB
SBWM MW-5s	UNK	nd	nd	nd	UNK	UNK	SBWM	Unknown	OB
Schmeltz	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	SC
Seaside #1	UNK	Steel	1/4	Rotary	1966	44	WMI	Municipal	SC
SEASIDE 02	ACT	nd	nd	nd	UNK	UNK	WMI	Unknown	NC
SEASIDE 03	ACT	nd	nd	nd	UNK	UNK	WMI	Unknown	NC
Seaside Rec. Center	ABD	nd	nd	nd	UNK	UNK	WMI	Destroy	SC
Seaside Sanitary District	UNK	nd	nd	nd	UNK	UNK	WMI	Unknown	SC
Shea/Johnen	IA	nd	nd	nd	UNK	UNK	SBWM	Monitoring	SC
Shi Ting Huang	IA	nd	nd	nd	UNK	UNK	SBWM	Unknown	SC
SNG	ACT	Steel	1/4	Rotary	1966	44	SBWM	Unknown	NC
Souza, Frank and Tina	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	SC
SPCA WDS	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Standex	IA	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
Stolich	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
StolichIA	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS

Table 11. (continued)

Name	Status	Casing	Casing Type	Drill Method	Drill Year	Well Age	Data Source	Well Use	Subarea
SUBDIV	UNK	nd	nd	nd	1962	48	SBWM	Unknown	LS
TAWorthwindmillABD	ABD	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Tom Phillips	DST	nd	nd	Cable	1959	51	WMI	Industrial	SC
Wang 02	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Wang 03	ACT	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Wang02072	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
WangOldIA	IA	nd	nd	nd	UNK	UNK	MPWMD	Unknown	LS
Water Pollution Control Plant	DST	Steel	10 gage	Rotary	1968	42	WMI	Destroy	NC
Watkins	DST	nd	na	na	UNK	UNK	WMI	Destroy	SC
WisonStreetEnt	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS
York School	ACT	nd	nd	nd	UNK	UNK	SBWM	Unknown	LS

Table 11. (continued)