

19. Gypsum/Limestone & Dolomite

Powders

19.6 Gypsum		SiO ₂	Al ₂ O ₃	Fe ₂ O ₃	CaO	MgO	K ₂ O	Na ₂ O	TiO ₂	SO ₃	CO ₂	Cl	H ₂ O+	SrO	L.O.I.	P ₂ O ₅	V ₂ O ₅	Size
196 CG 03109a		1.68	0.34	0.16	39.24	1.74	0.094	0.065	0.016	51.91	(4.02)	0.033	0.39	(0.27)	4.55	...	...	50g
196 CG 03110		7.21	1.92	0.63	28.5	4.92	0.38	0.021	...	32.55	(8.63)	0.019	14.27	(0.071)	(23.55)	...	...	50g
196 CG 03111a		0.63	0.14	0.11	32.3	2.47	0.026	0.14	0.01	40.72	(5.44)	0.0032	17.45	(0.096)	23.6	...	...	50g
196 CD FGD-1		0.13	0.023	0.014	32.7	0.007	0.007	0.005	...	46.4	0.02	...	20.70	0.012	21.04	0.03	0.0003	100g
196 CD FGD-2		0.21	0.033	0.043	32.8	0.019	0.01	0.02	...	45.6	0.62	...	20.38	0.024	21.33	0.05	0.0009	100g
196 CD GYP-A		0.45	0.10	0.05	32.9	0.18	0.021	0.009	...	46.2	0.47	...	19.4	0.11	20.06	0.011	...	100g
196 CD GYP-B		1.05	0.17	0.07	32.8	1.80	0.05	0.021	...	41.0	5.0	...	17.80	0.14	22.85	0.010	...	100g
196 CD GYP-C		3.5	0.79	0.40	30.4	5.35	0.36	0.022	...	33.0	11.2	...	14.37	0.35	25.93	0.018	...	100g
196 CD GYP-D		8.7	2.03	1.08	28.2	1.73	0.54	0.07	...	36.7	3.6	...	16.39	0.18	20.82	0.025	...	100g
196 CD TIG-1		0.11	0.57	0.26	32.3	0.12	0.008	0.036	0.82	43.4	1.41	...	20.3	0.42	22.03	0.04	0.10	100g

19.7 Limestone and Dolomite		CaO	SiO ₂	Al ₂ O ₃	Fe ₂ O ₃	TiO ₂	MnO	P ₂ O ₅	SrO	MgO	Na ₂ O	K ₂ O	Cr ₂ O ₃	L.O.I.	Other	Type	Size	
CRM 197 E 35		53.8	1.98	0.24	0.14	0.013	0.012	0.008	0.04	0.7	0.004	0.1	...	43.0		Calcitic	80g	
CRM 197 E 44		50.5	2.69	0.33	0.3	0.019	0.015	0.013	0.04	2.93	0.002	0.12	...	42.9			80g	
CRM 197 E 122		32.0	4.3	1.24	0.65	0.06	0.042	0.048	0.018	17.5	0.019	0.43	...	43.3		Dolomitic	80g	
CRM 197 A E752-1		55.4	0.70	0.12	0.045	0.009	0.010	(<0.01)	0.019	0.15	(<0.03)	0.02	...	43.4	BaO 0.006	Limestone	100g	
CRM 197 A E782-1		30.34	0.266	0.104	0.450	0.0042	0.081	0.0128	...	21.29	...	0.0260	0.0009	47.25		Dolomite	100G	
CRM 197 TI E701-1		52.7	1.99	0.55	1.04	0.03	0.028	0.05	...	0.6	...	...	...	...	S 0.040	Calcitic	100g
197 GC AN34		57.2	1.02	0.38	1.05	0.02	...	...	...	40.0	0.11	0.08	0.01	...	Mn ₂ O ₄ 0.14	Dolomite	100g
197 GC 2CAS6		30.8	1.71	0.67	0.49	0.03	...	...	...	19.7	0.04	0.14	<0.01	45.9	Mn ₂ O ₄ 0.07	Dolomitic	100g
Results calculated to the Ignited Basis																		
197 DH X0907		28.67	3.91	0.846	0.84	0.065	0.046	0.067	...	20.06	0.045	0.349	...	44.68	SO ₃ 0.105	Dolomite	100g	
197 DH X0908		26.57	8.55	1.93	1.19	0.140	0.045	0.086	...	18.59	0.056	0.734	...	41.39	SO ₃ 0.242	Dolomite	100g	
197 DH X0909		34.94	6.71	1.55	0.92	0.110	0.037	0.065	...	12.99	0.043	0.589	...	41.59	SO ₃ 0.180	Dolomite	100g	
197 DH X0912		32.78	7.14	5.59	11.36	0.292	1.34	0.495	...	27.99	0.051	0.076	...	12.43	SO ₃ 0.502	Recycled Dolomite	100g	
197 DH X0913		25.23	5.23	3.44	18.76	0.164	0.78	0.226	...	30.31	0.041	0.058	...	14.89	SO ₃ 0.389	Recycled Dolomite	100g	
197 S JLS-1		55.09	0.120	0.0207	0.0178	0.0020	0.00209	0.0295	0.035	0.606	0.00194	0.00297	0.0005	...	~50 elements at ppm levels		100g	
197 S JDC-1		33.96	0.216	0.0174	0.0232	0.00133	0.00657	0.0343	0.014	18.47	0.0129	0.00232	0.0012	...	~50 elements at ppm levels		100g	
197 CG 03105		53.27	1.98	0.29	0.14	0.016	0.0045	0.0088	...	1.40	0.026	0.059	...	42.82	SO ₃ , Cl		50g	
197 CG 03105a		54.03	1.09	0.24	0.11	0.010	0.0067	0.0081	...	0.81	0.017	0.084	...	43.12	SO ₃ , Cl		50g	
197 CG 03106		50.38	4.38	0.64	0.29	0.034	0.0071	0.013	...	2.28	0.07	0.14	...	41.58	SO ₃ , Cl		50g	
197 CG 03106a		51.61	2.09	0.33	0.17	0.015	0.0089	0.0061	...	2.25	0.017	0.17	...	42.84	SO ₃ , Cl		50g	
197 CG 03107		49.94	3.76	1.25	0.78	0.059	0.019	0.04	...	2.18	0.026	0.5	...	41.35	SO ₃ , Cl		50g	
197 CG 03108		47.49	3.84	0.88	1.97	0.014	0.19	0.04	...	3.63	0.024	0.23	...	41.52	SO ₃ , Cl		50g	
197 CG 07108		35.67	15.60	5.03	2.52	0.327	0.056	0.051	0.108	5.19	0.081	0.78	0.004	34.5	~50 elements at ppm levels		70g	
197 CG 07114		30.02	0.62	0.1	0.04	0.015	0.01	0.006	0.006	21.8	0.03	0.038	0.0005	47.1	~50 elements at ppm levels		100g	
197 CG 07214		54.95	0.38	0.017	0.071	...	0.009	...	...	0.67	...	...	...	43.57	P, S		50g
197 CG 07215		51.56	1.17	0.5	0.292	...	0.018	...	...	2.67	...	...	...	43.22	P, S		50g
197 CG 07216		36.55	0.092	0.027	0.226	...	0.029	...	...	16.59	...	...	...	46.23	P, S	Dolomite	50g
197 CG 07217		30.6	0.96	0.295	0.376	...	0.062	...	...	20.73	...	...	...	46.3	P, S	Dolomite	50g
197 CG 07210		51.32	3.26	0.58	1.04	0.037	0.024	36.89	0.077	0.43	0.33	0.17	...	...	F 3.54	Phosphate	100g
197 CG 07211		40.71	3.61	2.58	1.08	0.14	0.015	2.086	0.16	8.19	0.059	0.28	...	...	F 2.05	Phosphate	100g
197 CG 07212		19.42	38.8	4.06	3.08	0.48	0.026	6.06	0.055	7.12	0.14	2.63	...	...	F 0.51	Phosphate	100g
197 BG COD 35B		32.44	0.100	0.037	0.017	...	...	...	...	20.03	...	...	...	47.24	CO ₂ 47.29	Dolomite	50g
197 B 88b		29.95	1.13	0.336	0.277	...	0.0160	0.0044	0.0076	21.03	0.0290	0.1030	...	...	CO ₂ 46.37	Dolomitic limestone	75g

19.7a Trace elements in Synthetic Limestone		All Elements ppm														
	Ag	As	B	Ba	Be	Bi	Cd	Ce	Co	Cr	Cu	Ga	La	Li	Mn	
197 CG 07712	0.030	2.2	2.2	24	0.22	0.23	0.023	2.8	2.3	2.3	2.2	2.8	2.6	3.2	37	
197 CG 07713	0.060	5.2	5	54	0.52	0.53	0.053	5.8	5.3	5.3	5.2	5.8	5.6	6.2	67	
197 CG 07714	0.11	10.2	10	104	1.0	1.0	0.10	11	10.3	10.3	10.2	10.8	10.6	11.2	117	
197 CG 07715	0.21	20	20	204	2.0	2.0	0.20	21	20.3	20.3	20	20.8	20.6	21	217	
197 CG 07716	0.51	50	50	504	5.0	5.0	0.50	51	50	50	50	51	50.6	51	517	
197 CG 07717	1.0	100	100	1000	10	10	1.00	101	100	100	100	101	101	101	1020	
197 CG 07718	2.0	200	200	2000	20	20	2.00	200	200	200	200	200	200	200	2020	
197 CG 07719	5.0	500	500	5000	50	50	5.00	500	...	...	500	...	...	500	5000
197 CG 07720	10	...	...	...	100	100	10	...	...	...	1000	...	...	...	10000

In each case, the matrix for this set is the same: 85% CaCO₃, 8% MgCO₃, 5.2% SiO₂, 1.1% Al₂O₃, trace Fe₂O₃, Na₂SO₄.

Continuation from above		All Elements ppm															Size
	Mo	Nb	Ni	Pb	Sb	Sn	Sr	Ti	V	W	Y	Yb	Zn	Zr			
197 CG 07712	0.21	2.5	2.1	2.4	0.21	0.28	110	31	3.2	0.22	2.1	0.22	3.0	4.0			
197 CG 07713	0.51	5.5	5.1	5.4	0.51	0.58	200	61	6.2	0.52	5.1	0.52	6.0	7.0			
197 CG 07714	1.0	10.5	10	10.4	1.0	1.1	250	111	11.2	1.0	10	1.0	11	12			
197 CG 07715	2.0	20.5	20	20.4	2.0	2.1	350	210	21	2.0	20	2.0	21	22			
197 CG 07716	5.0	50.5	50	50	5.0	5.1	650	510	51	5.0	50	5.0	51	52			
197 CG 07717	10	100	100	100	10	10	1150	1010	101	10	100	10	101	102			
197 CG 07718	20	200	200	200	20	20	2200	2000	200	20	200	20	200	202			
197 CG 07719	50	...	500	500	50	50	5200	5000	500	50	...	50	500	500			
197 CG 07720	100	...	...	1000	100	100	...	...	...	100	...	100	1000	...

