	A	B	C	D	E	F	G
1	**Appendix 2**	**Aug. 29/13**					
2	**Accession #**	**Catalogue #**	**Country**	**City**	**Site of screw**	**Location in site**	**Structure type**
3	1	SP1	Cyprus, South	Episkopi	Episkopi street	Outside Anthony's Garden House	Screw press
4	2	SP2	Greece	Sparti	Museum of the Olive and Greek Olive Oil	Display of screw presses in museum	Screw presses
5	3	WS1	Egypt	Alexandria	Unknown	Unknown	Plaque or figurine
6	4	WS2	Egypt	Memphis	Unknown	Unknown	Plaque or figurine
7	5	WS3	Italy	Pompeii	Casa di P. Cornelius Teges	Unknown	Fresco
8	6	WS4	Italy	Syracuse	Unknown	Vitruvius. *De Architectura*	Water screw
9	7	P1	Italy	General	General	Pliny *HN* 18.74.317	Lever-and-beam press

	A	B	C	D	E	F	G
10	8	SP3	Italy	General	General	Pliny *HN* 18.74.317	Lever-and-screw press
11	9	SP4	Italy	General	General	Pliny *HN* 18.74.317	Weighted screw press
12	10	SP5	Italy	General	General	Pliny *HN* 18.74.317	Direct-screw press
13	11	SP6	Egypt	Alexandria	General	Hero. *Mechanika*	Single-screw (congeries) press
14	12	SP7	Egypt	Alexandria	General	Hero. *Mechanika*	Twin-screw press
15	13	P2	Italy	Pompeii; Herculaneum	General	House of Vetii, Pompeii; unknown, Herculaneum	Wedge-and beam press
16	14	P3	Egypt	Alexandria	General	Hero. *Mechanika*	Lever-and-drum press
17	15	MS1	Egypt	Alexandria	General	Hero. *Dioptra*	Odometer

	A	B	C	D	E	F	G
18	16	MS2	Egypt	Alexandria	General	Hero. *Pneumatics*	Siphon
19	17	MS3	Egypt	Alexandria	General	Hero. *Mechanika*	Screw-cutter
20	18	MS4	Egypt	Alexandria	General	Hero. *Mechanika*	Inside screw thread (nut) cutter
21	19	MS5	Italy	Syracuse	Syracuse	*Syracusia*	Screw windlass
22	20	MS6	Italy	Syracuse	Syracuse	*Syracusia*	Compound pulley
23	21	T1	Italy	Capua	Unknown	Relief on the Tomb of the Haterii	Treadmill crane
24	22	T2	Italy	Rome	General	General	Pivoting device

	A	B	C	D	E	F	G
25	23	T3	Italy and Greece	General	General	General	Stone-working tools
26	24	T4	Greece, Rome	Unknown	Unknown	General	Lathe

	H	I	J	K	L	M
1						
2	**Culture**	**Notes/discussion/context**	**Spiral direction**	**Material**	**Date**	**Keywords**
3	Modern	Small screw press with iron bars, screw and bottom plate; wooden crossbar and pressing disk; mounted on stone block	Z spiral	wood and iron	19th or 20th c. AD	Cyprus, Episkopi, screw press, Z spiral
4	Modern	Diagrams, models of wooden, iron and hydraulic presses; 3 (retired) working presses	Z spiral	wood and iron	19th or 20th c. AD	Greece, Sparti, screw press, olive, oil, Z spiral
5	Egyptian/Roman	Figure treading Archimedean water screw	Unknown - only outside cylinder shown	Terracotta	1st c. BC	Egypt, Alexandria, Archimedes, water screw, terracotta
6	Egyptian/Roman	Figure treading Archimedean water screw	Unknown - only outside cylinder shown	Terracotta	1st c. BC-1st c. AD	Egypt, Memphis, Archimedes, water screw, terracotta
7	Roman	Figure treading Archimedean water screw	Unknown - only outside cylinder shown	Painted mural	1st c. AD	Italy, Pompeii, water screw, fresco
8	Greek	Invented by Archimedes; Vitruvius gives instructions for building water screw	Z spiral in Morgan 1914 diagram; Vitruvius shows no illustration	Wood and iron	3rd c. BC	Italy, Syracuse, Archimedes, Egypt, water screw, Vitruvius
9	Greek/Roman	Description of lever-and-beam press	No screws	Wood	to Pliny's time	Italy, lever, press, beam, Pliny

	H	I	J	K	L	M
10	Greek/Roman	Description of lever-and-screw press	Z spiral	Wood	1st c. BC-1st c. AD	Italy, lever, screw, press, Pliny
11	Greek/Roman	Description of weighted screw press	Z spiral	Wood and stone	1st c. BC-1st c. AD	Italy, weight, stone, lever, screw, press, Pliny
12	Roman	Description of direct-screw press	Z spiral	Wood	1st c. AD	Italy, direct, screw, press, Pliny
13	Alexandrian	Description of single-screw (congeries) press	Z spiral	Wood	AD 50	Egypt, Alexandria, Hero, single, screw, congeries, press
14	Greek	Description of twin-screw press	Z spiral	Wood	AD 50	Egypt, Alexandria, Hero, double, twin, screw, press
15	Roman	Known only from 2 "fanciful" wall-paintings	No screws	Wood	1st c. AD	Pompeii, Herculaneum, mural, wedge, beam, press
16	Greek	Description of lever-and-drum press	No screws	Wood	1st c. AD	Egypt, Alexandria, Hero, lever, drum, press
17	Greek	Hero. *Dioptra*	Unknown	Wood and iron	1st c. AD	Egypt, Alexandria, Hero, screw, distance, measure

	H	I	J	K	L	M
18	Greek	Hero. *Pneumatics*	Unknown	Wood, iron, clay, glass	1st c. AD	Egypt, Alexandria, Hero, siphon
19	Alexandrian	Hero. *Mechanika*	Unknown	Wood and iron	1st c. AD	Egypt, Alexandria, Hero, screw, cutter
20	Alexandrian	Hero. *Mechanika*	Unknown	Wood and iron	1st c. AD	Egypt, Alexandria, Hero, screw, nut, cutter
21	Greek	Used to launch great ship *Syracusia* commissioned by Hieron II; combined with compound pulley to pull ship	Unknown	Wood and iron	3rd c. BC	Italy, Syracuse, Archimedes, Hieron II, *Syracusia*, screw, windlass, pulley
22	Greek	Used to launch great ship *Syracusia* commissioned by Hieron II; combined with screw windlass to pull ship	Unknown	Wood and iron	3rd c. BC	Italy, Syracuse, Archimedes, Hieron II, *Syracusia*, screw, windlass, pulley
23	Roman	Treadmill crane showing monolithic column being erected	No screws	Wood and iron	1st c. AD	Italy, Capua, treadmill, crane, column,
24	Roman	Used to raise large monolithic columns, *e.g.*, for Pantheon porch	No screws	Wood and iron	1st c. AD	Italy, Rome, pivot, column, monolithic, Pantheon

	H	I	J	K	L	M
25	Greek/Roman	Iron tools with wooden handles	No screws	Wood and iron	1st millennium BC onwards	Italy, Greece, stoneworking, tools, stone, iron, wood, hammer, mallet, punch, point, chisel, gouge, square
26	Greek/Roman	Invented or noted by Theodorus of Samos; known by Pliny and Vitruvius	No screws	Wood	6th century BC?	Greece, Rome, Theodorus, Vitruvius, Pliny, woodworking, stoneworking, tools, lathe

	N	O	P	Q
1				
2	**Source**	**Photo #**	**Photo date**	**References**
3	GH	IMG_9832.JPG	2012	xx
4	GH	IMG_0347.JPG-IMG_0348.JPG; IMG_0350.JPG-IMG_0351.JPG; IMG_0353.JPG; IMG_0355.JPG	2012	xx
5	Oleson 1984; Bowman 1986	xx	1984, 1986	Oleson 1984: fig. 71; Bowman 1986: 16, fig. 7
6	Oleson 1984	xx	1984	Oleson 1984: fig. 86
7	Oleson 1984	xx	1984	Oleson 1984: fig. 101
8	Vitruvius; Oleson 2004	xx	2004	Vitr. *De arch.* 5.12.5, 10.6.1-4; Diod. Sic. 5.37.2-4; Strabo 3.2.9; Oleson 2004: 75-80, figs. 10-14
9	Pliny *HN* 18.74.317	xx	1932, 1975	Pliny *HN* 18.317; White 1975: 230; figs. 60-62; Drachmann 1932: 145-148, figs. 12-16

	N	O	P	Q
10	Pliny *HN* 18.74.317	xx	1898, 1975	White 1975: 230-231, figs. 61-62; Paton 1898: 211; Drachmann 1932: 146 fig. 14; Heron *Mech.* 3.2.15, 180-184 [original pagination], 182, fig. 57
11	Pliny *HN* 18.74.317	xx	1975	White 1975: 230-231, fig. 62; *HN* 18.374.317
12	Pliny *HN* 18.74.317	xx	1932	*HN* 18.74.317; Drachmann 1932: 149 fig. 17
13	Hero *Mech*. 3.2.19	xx	1975, 1988	White 1975: 231-32, figs. 63-65; Hero 3.2.19, 187-94 [original pagination], 188, fig. 58; Drachmann 1988: 293-99, 294 fig. 50a
14	Hero *Mech*. 3.2.19	xx	1975, 1988	White 1975: 231-32, figs. 63-65; Hero 3.2.19, 187-94 [original pagination], 188, fig. 58; Drachmann 1988: 293-99, 294 fig. 50a
15	2 wall-paintings	xx	1932, 1975	White 1975: 232; fig. 66; Drachmann 1932: 52
16	Drachmann 1932	xx	1932	Drachmann 1932: 63-67, 151 fig. 20
17	Humphrey 2006	xx	2006	Humphrey 2006: 118-20, 121 fig. 4

	N	O	P	Q
18	Heron *Pneum.* 4; Hall 1851	xx	1851	Heron *Pneum.* 4; Hall 1851: 17-18, 17 fig. 4
19	Heron *Mech.* 2.5; Carra de Vaux 1894; Drachmann 1963	xx	1894, 1963	Heron *Mech.* 2.5; Carra de Vaux 1894: 101-4 [original pagination], 103 fig. 26; Drachmann 1963: 56-9, 57 fig. 17a, 58 fig. 17b
20	Heron *Mech. 3.21*; Carra de Vaux 1894; Drachmann 1963	xx	1894, 1963	Heron *Mech.* 3.21; Carra de Vaux 1894: 192-94 [original pagination]; Drachmann 1963: 135-40, 136 fig. 52a, 137 fig. 52b, 138 fig. 53a, 139 fig. 53b, 140 fig. 54
21	Ath. 5.207.b; Simms 1996; Drachmann 1958a	xx	1958, 1996	Ath. 5.207.b; Simms 1996: 47-52, 48 fig. 1; Drachmann 1958a: 280-281
22	Drachmann 1958a	xx	1958	Ath. 5.207.b; Simms 1996; Drachmann 1958a
23	Adam 1994; Taylor 2003	xx	1994, 2003	Adam 1994: 46 figs. 92-5; Taylor 2003: 117 fig. 54, 118
24	Taylor 2003; Adam 1994	xx	1994, 2003	Taylor 2003: 118, 120 fig. 56; Adam 1994: 47 fig. 98

	N	O	P	Q
25	Adam 1994; Fant 2008; Malacrino 2010; Camp and Dinsmoor 1984	xx	1984, 1994, 2008, 2010	Adam 1994: 32 fig. 45; Fant 122-23, 125, 129; Malacrino 2010: 38-9, fig. p. 39; Camp and Dinsmoor 1984: 10
26	Pliny; Vitruvius; Blagg 1976; Fant 2008	xx	1976, 2008	Pliny *HN* 7.56.198, 36.19.90; Vitruvius *De arch*. 7.Pref.12; Fant 2008: 132; Blagg 1976: 165, 168, 169 fig. 2B