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The option of Roman canal construction by Drusus in the Vecht river area (the Netherlands): a
geoarchaeological approach

Supplementary appendix C

Method and table of results of the inventory of archaeological finds and sites

The artefact finds and site location data have been gathered from various sources. Physical verification of the determination of individual finds and ground-truthing of the sites was not feasible in view of the scope of this research. The basis of our inventory of Mesolithic to Roman date was formed by the locations of archaeological finds/sites extracted from [the national database Archis3](#) (consulted November 2018). These locations have been supplemented with the inventory of archaeological finds from the Iron Age and Roman period in the Vecht region, made by [Kok \(2008\)](#). In doing so he specifically searched for data that were not generally known and did not occur in Archis3. Furthermore, finds were taken from the project "Portable Antiquities of the Netherlands" (PAN-database, selection exported in February 2019, www.portable-antiquities.nl/pan). The advantage of the PAN database is that the finds have been validated. Finally, a number of reliable separate find reports from the literature have been included.

The most important data recorded in the data table of the inventoried locations concern location (toponym and spatial coordinates), type of find(s), dating, find conditions and references if available. A geomorphological or archaeological layer from which the finds originated was mostly not known. In the elaboration, both in the table and in the map image – in addition to isolated finds - sites with two or more finds were indicated as "possible settlement" and the sites with ten or more finds as "settlement".

For legend, see below the table

Nr.	Town name	Toponym	Coord X (Dutch RD)	Coord Y (Dutch RD)	Character of finds	Period	Research / project	Character of site / depth	Source	Source specification
1	Amsterdam	Damrak	121.750	487.810	two hammer axes, sharpened	NEOL	Nort-south metro line	in residual gully, at a deapth of ca. 16 / 18 m below sea level	Lit.	Kranendonk et al 2015
2	Amsterdam	Damrak	121.750	487.810	sherds from the Bell Beaker period, mill stone	NEOL	Nort-south metro line	at ca. 12,5 m below sea level	Lit.	Kranendonk et al 2015
3	Amsterdam	Rokin	121.310	487.070	bones, piercer of bone, sherds, including a Bell Beaker edge sherd	BRM of BRL	Nort-south metro line		Lit.	Kranendonk et al 2015
4	Amsterdam	Noord-zuid lijn			spearhead	BRL-IJZV	Nort-south metro line		Lit.	Abrahamse et al. 2012, 14
5	Amsterdam	Waterlooplein	122.000	486.700	half aes of Constantius II	ROML	detector find		Archis	2947901100 / 43115
6	Amsterdam	Waterlooplein	122.000	486.700	antoninianus of Tetricus I, barbarian	ROML	detector find		Archis	2947901100 / 43115
7	Amsterdam	Waterlooplein	122.000	486.700	foliis of Constantius II or Constans, from Trier (D), 337-341	ROML	detector find		Archis	2947901100 / 43115
8	Amsterdam	Weesperstraat	122.200	486.460	fibula (hook-type)	ROMV	1972 excavation		Archis	3090590100 15202
9	Amsterdam	Weesperplein / Weesperstraat	122.320	486.080	sestertius of Vespasianus	ROMM	1974 excavation		Archis	2777437100 / 15204
10	Amsterdam	Weesperplein / Weesperstraat	122.320	486.080	foliis of Constantinus	ROML	1974 excavation		Archis	2777437100 / 15204
11	Amsterdam	Weesperplein	122.360	486.020	as of Edionatus	ROMM	1973 excavation		Archis	2777429100 / 15203
12	Amsterdam	Weesperplein			Roman coin of Domitianus, 81 AD	ROMM	Metro 1973		Lit.	Abrahamse et al. 2012, 15
13	Amstelveen	-	120.667	481.081	1 fragment of dolium, object nr. 279119	ROMV-ROML	1986, cores		Archis	2040879100 / 102227
14	Nes aan de Amstel	Lange Kamp	121.146	474.088	1 potsherd (type Ruinen-Wommels III)	IJZL	1986, cores		Archis	2040879100 / 102338
15	Mijdrecht	Polder De Derde Bedijking	116.580	468.760	2 sherds handmade, 1 flint cut-off, 1 fragment charcoal	NEOM-NEOL (estimate on the basis of position of the layer vs. natural sequence)	1996, test pit		Archis	2871201100 / 30549
16	Mijdrecht	Polder De Derde Bedijking	116.780	468.850	1 flint cut-off	NEOM-NEOL	1996, field survey		Archis	2871242100 / 30556
17	Mijdrecht	Polder De Derde Bedijking	117.100	468.370	3 flint cut-off	NEOM	1996, field survey		Archis	2871218100 / 30552

18	Diemen?	Buiten-IJ			bronze winged axe				Lit.	Abrahamse et al. 2012, 14 (Schmitz 1986, 36)
19	Diemen	Overdiemen	129.000	483.100	sestertius of Vaspasianus, 71 AD	ROM	ca. 2015, metal detection	probably supplied, construction of new road to IJburg-east	Lit.	Cruysheer 2012, 8
20	Driemond	Stammerlandweg	129.000	481.400	denarius (possibly of Domitianus)	ROMV-ROMM	2017, metal detection	near surface	PAN	PAN-00025740
21	Muiden	Park Bredius	132.628	482.387	trunk canoe	IJZV	2015 / 2018	Sports and green space plan area	Archis	3296866100 (Hoven en Leuvering 2016, Schute 2018)
22	Weesp	Aetsveldse Polder	131.138	478.579		IJZL			Lit.	Bos et al. 2009
23	Weesp	Aetsveldseweg 4	131.200	478.600	several bone fragments	IJZM-IJZL	1975		Archis	3090728100 / 15207
24	Weesp	Aetsveldseweg 4	131.200	478.600	1 weaving weight triangular, bone fragments: 1 otter, 3 beaver, 7 pig, 15 sheep/goat, 4 dog, 10 horse, 104 beef, metal slags, 1 cheese mould, 1 fibula (wire type), 2 spin stones, ceramics (Ruinen-Wommels III), boulders, soil traces, posts partly along trench	IJZM-IJZL	1966, test pits	on embankment of a creek	Archis	2891663100 / 33987
25	Weesp	Aetsveldse Polder	131.280	478.345		IJZL			Lit.	Bos et al. 2009
26	Weesp	Aetsveldse Polder	131.475	478.199		IJZM-IJZL			Lit.	Bos et al. 2009
27	Weesp	Aetsveldsche polder	131.480	478.200	6 sherds hand made, charcoal and burnt loam	IJZ (?)	2004, cores		Archis	3171841100 / 48829
28	Weesp	Aetsveldse Polder	131.500	478.071		IJZL			Lit.	Bos et al. 2009
29	Weesp	Aetsveldse Polder	131.675	478.050		IJZM		0-50 cm	Lit.	Bos et al. 2009; also Archis 2034552100 / 138317
30	Nigtevecht	Hinderdam	133.000	477.600	denarius of Traianus	ROMM	metal detection	near surface	Pers c	found by Rob de Graaf, via A. Cruysheer 20-3-2019
31	Nigtevecht	Gartenstraat	130.489	476.546	Trunk canoe (oak) with pottery sherds and tephrite, ca. 600 BC	Ca. 600 BC, pottery has resemblances with pottery from Assendelver Polders	1987		Archis	3204224100 / 405026
32	Nigtevecht	dorp	130.500	476.200	"primitive vessel"	IJZ (estimate)	1960's: civil digging works	-	Lit.	Kok 2008 (Poolman 1969)
33	Overmeer (Nederhorst den Berg)	Randweg / Meerlaan	131.950	473.920	Pottery, 2 fragments	2nd century AD	2007: observations		Lit.	Kok 2008 (Cruysheer 2008)

34	Overmeer (Nederhorst den Berg)	Horstermeerpolder	134.000	473.500	Roman jugamphora	ROMM	incidental find, end of 19th century	after the reclamation of the eastern part of the Horstemeer	Pers c	via A. Cruysheer Decembre 2018
35	Abcoude	Aetsveldse Polder	129.012	476.964	1 sherd Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104611
36	Abcoude	Aetsveldse Polder	129.031	476.836	1 sherd Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104613
37	Abcoude	Aetsveldse Polder	129.100	476.800	Finds and traces from the late Iron age	IJZL	2004	Terrain is laying on ridge of a creek, find depth 0-100 cm	Archis	3131551100 / 48510
38	Abcoude	Aetsveldse Polder	129.217	476.419	1 sherd Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104644
39	Abcoude	Aetsveldse Polder	129.316	476.608	1 sherd Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104661
40	Abcoude	Aetsveldse Polder	129.335	476.674	134 sherds Ruinen-Wommels III, high shape	IJZL	1985, cores		Archis	2974023100 / 104666
41	Abcoude	Aetsveldse Polder	129.342	476.769	1 sherd Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104668
42	Abcoude	Aetsveldse Polder	129.360	476.642	10 sherds Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104673
43	Abcoude	Aetsveldse Polder	129.371	476.635	2 sherds Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104674
44	Abcoude	Aetsveldse Polder	129.380	476.661		IJZL		10-100 cm	Lit.	Bos et al. 2009
45	Abcoude	Aetsveldse Polder	129.388	476.609	1 sherd Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104677
46	Abcoude	Aetsveldse Polder	129.396	476.581	1 sherd Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104679
47	Abcoude	Aetsveldse Polder	129.438	476.656	6 sherds Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104692
48	Abcoude	Aetsveldse Polder	129.455	476.542	2 sherds Ruinen-Wommels III, high shape	IJZL	1986, cores		Archis	2040879100 / 104700
49	Abcoude	Kerkstraat	127.140	476.340	10 fragments of handmade pottery from ditch slopes, 2 ex with nail prints	IJZ	1972: incidental finds; 1991, 2005: cores	near levee, find depth 60-150 cm	Archis	2690759100 / 1025 3063325100 / 59832

50	Abcoude	Hollandse kade / stationsgeb	127.160	476.425	Layer with finds, related to location Kerkstraat	IJZ	2005		Archis	3056902100 / 57895 3194570100 / 400283
51	Abcoude	Aquaduct	127.182	476.469	Archaeological remains, deeper than 20-30 cm below surface	IJZM-IJZL(?)	2003, archaeological guiding of civil works		Archis	2079119100 / 48785
52	Abcoude	Golfbaan nabij Abcoudermeer	125.800	477.200	Denarius of Geta (200-202 AD)	ROMM	detector find	Nabij Abcoudermeer and Holendrecht, probably supplied (construction of a golf course)	Lit.	Cruysheer 2012, 12
53	Abcoude	(Holendrechteweg)	124.181	477.258	1 fragment handmade pottery	BRL	1986, cores		Archis	2040879100 / 102876
54	Abcoude	(Holendrechteweg)	124.597	476.941	1 fragment urnfields pottery	BRL	1986, cores		Archis	2040879100 / 103013
55	Abcoude	Winkeldijk	126.515	474.978	tree trunk (possibly of marsh bush)	ROM	2012, cores		Archis	2364028100
56	Abcoude	Zuid	126.557	475.279	Traces of occupation and land use, deducted from pollen analysis	IJZ / ROM (estimate)	2008, test pits		Archis	2217020100 / 418219
57	Abcoude	Molenweg / Van Gaesbeeklaan	127.050	475.800	Roman coin, denarius, dated 54 BC	ROMV	before 1974		Archis	2948039100 / 43137
58	Baambrugge	De Horn	127.600	474.100	Roman coin, denarius, dated 32-31 BC	ROMV	2014, metal detection	near surface	PAN	PAN-00053853
59	Baambrugge	Kleiweg	127.700	473.260	1 weaving comb, 3 spin stones, animal bones, fish waste, coprolite, many pottery sherds, piercer	IJZM-IJZL	1969, from dumping ground of building pit, test pits by AWN	On levee and in gully fills, 50-120 cm	Archis	3109909100 / 26227
60	Baambrugge	Kleiweg	127.720	473.270	786 pottery sherds, sandblasted with pottery grit, Ruinen-Wommels III, Post 14C-age 250 +/- 50 BC	IJZL	Test pits by AWN		Archis	3189540100 / 59681
61	Baambrugge	Kromwijck	127.840	473.381	1 fragment handmade pottery	IJZ	2013, cores		Archis	2419279100 / 58494
62	Vreeland	Bergseweg 2a	130.888	471.554	1 hals van kruikamfoor, Romeins	ROMV	1970, dumping ground of building pit ca. 1,5 m deep, notified in 2008		Archis	3254591100 / 420795

63	Loenersloot	-			tombstone	2b	16th century	probably supplied	Lit.	Kok 2008
64	Loenersloot	Polder Voorburg	128.620	471.150	pottery fragment	IJZ?	1983-84: field survey	On channel ridge	Lit.	Kok 2008 (Van Zweden e.a. 1985)
65	Loenen	Polder Sticht	129.470	469.090	Roman sherd	ROMV-ROMM	2005: excavation		Lit.	Kok 2008 (Visser, Cruysheer & Van der Sar 2005)
66	Loenen a.d. Vecht	Cronenburgh	129.573	469.016	2 fragments Roman pottery	ROMV-ROMM	2005, civil works on the place of a former mill		Lit.	Kok 2008; ook Archis 3217760100 / 407835
67	Loenen	-	130.000	469.000	Roman coin of Nero, dupondius or as	66-67 AD	1922	with cultivation work on land	Lit.	Kok 2008 (Anonymus 1922)
68	Loenen a.d. Vecht	Recreatiecentrum Mijnden	130.710	468.110	1 fragment Roman pottery, strongly worn-out, supplied?	ROMM, Terra sig Drag 18/31	1969	supplied?	Archis	3063074100 / 59752
69	Nieuwersluis	-	129.000	468.000	denarius of Caesar Octavianus	Ca. 36 BC	1914: incidental find		Lit.	Kok 2008 (Van Hoorn 1926; Byvanck 1943)
70	Nieuwer-Ter-Aa	Kerklaan	126.800	467.200	1 sherd handmade	IJZV	1986, find from ditch slope		Archis	2948111100 / 43146
71	Breukelen	Breukelerwaard	127.540	465.000	Ca. 1000 pieces handmade pottery, bone	IJZV-IJZM	2002, test pits, reworked site		Archis	2037541100 / 49596
72	Breukelen	Breukelerwaard	127.750	465.025	35 sherds handmade, 5 sherds IJZM-L, 3 sherds with quartz grit, 5 sherds with pottery grit, 2 sherds with finger prints on rim	IJZ(M-L), maybe also ROM	1997, field survey		Archis	3155788100 / 132566
73	Breukelen	-	128.500	465.000	pendant	2nd century AD	before 1955		Lit.	Kok 2008
74	Maarssen	Maarsseveensevaart	132.000	461.800	Coin of emperor Galba	68-69 AD	1975: incidental find	probably supplied	Lit.	Kok 2008 (De Jong 1975)
75	Maarssen	Oostwaard 10	132.300	460.850	bead	BRV	1986, field survey		Archis	2948160100 / 43191
76	Maarssen	Oostwaard	132.320	460.360	some pottery sherds	ROM	1947	probably supplied	Lit.	Kok 2008 (Kroniek 1970-1979, p. 37; Kroniek 1985-1987, p. 30)
77	Maarssen	Ringdijk Maarsseveense polder	134.000	462.000	solidus of Honorius	395-423 AD	1866	in ring dyke, probably supplied	Lit.	Kok 2008 (De Boone 1959)
78	Maarssenbroek	Zuilense Ring	131.138	459.500	Mortarium, 1 fragment of handmade pottery	ROM, maybe also IJZL	1973, field inspection		Archis	2948152100 / 43187
79	Utrecht	Isotopenweg / Lage Weide	132.620	459.050	1 fragment of handmade pottery	IJZL	1983, drainage works		Archis	3146359100 / 43186

80	Utrecht	Oud Zuilen	133.360	459.710	Roman sherds and as of Antoninus Pius 138-161 AD	ROM	2000 / 01: observations / metal detection	probably supplied	Lit.	Kok 2008 (Van Renswoude 2002)
81	Utrecht	Fortlaan	134.580	458.900	Coin: aes III of Valens (364-378) minted at Arles, 364-367	ROML	1964		Archis	2961363100 / 45569
82	Utrecht	Overvecht	137.040	459.660	1 flint cut-off	MESO-NEO	1994, cores		Archis	2030389100 / 123201
83	Utrecht	Gerrit Rietveld College	137.836	458.054	1 fragment bone (burnt), 3 fragments broken Quartz, charcoal	PALEOL - NEOL	2011, cores	in top of cover sands, below peat sequence	Archis	2352201100 / 433944
84	Utrecht	Burg. van Tuyllkade	134.600	458.150	Dolabra	ROM	1966		Archis	2961541100 / 45638
85	Utrecht	Thorbeckepark	135.100	457.510	2 small fragments handmade pottery (described as native Roman)	ROM (eventueel IJZ)	2009, cores	levee	Archis	2239994100 / 34504
86	Utrecht	Marnixlaan / Van Hoornekade	135.195	457.987	2 fragments Wheel-turned pottery (Roman)	ROMV (1st centry AD conform commentary)	2009, excavation		Archis	2227251100 / 32723
87	Utrecht	Marnixlaan / Van Hoornekade	135.195	457.987	492 fragments handmade pottery	ROM (ook IJZ?)	2009, excavation		Archis	2227251100 / 423544
88	Zuilen	Thorbeckelaan	135.242	457.607	Hammer axe of lydite	NEO	1923, civil works		Archis	3254631100/ 420803
89	Utrecht	Abrikoosstraat	135.610	457.730	2 fragments of handmate pottery, Rough surface 'besmeten', impoverished with pottery grit	IJZ	2010, test pits		Archis	2294669100 / 42080
90	Utrecht	RWZI Zandpad	135.635	458.123	2 cut-offs and 18 other flint fragments	MESO-BRV	2015, cores		Archis	2479770100 / 66232
91	Westbroek	Polder De Gagel	136.300	461.140	1 fragment flint waste	MESO-BRV	1994, cores		Archis	2027287100 / 123199
92	Groenekan	Ruigenhoeksche Polder	137.620	460.860	1 scraper, belonging to flint hoard, 3 blades, 1 cut-off with retouche, 1 core piece, 25 cut-offs en 7 waste (7 obj.nrs.)	MESO	1994, cores	On high part of ridge of cover sands	Archis	2035168100 / 123195
93	Groenekan	Ruigenhoeksche Polder	137.780	461.450	1 fragment flint waste	MESO-NEO	1994, cores		Archis	2035168100 / 123196
94	Groenekan	Ruigenhoeksche Polder	137.840	461.260	1 fragment flint waste	MESO-NEO	1994, cores		Archis	2035168100 / 123198
95	Groenekan	Ruigenhoeksche Polder	137.960	461.140	1 flint cut-off	MESO-NEO	1994, cores		Archis	2035168100 / 123197

96	Hilversum	N-236	135.660	467.870	3 fragment of pottery, not datable	NEO (?)	2007, cores	in top of cover sands, below peat sequence	Archis	2165724100 / 411522
97	Hilversum	Kerkelanden	137.110	469.330	1 afslag vuursteen	NEO (det. Stapert)	1984, inspection of ditch slope		Archis	2777567100 / 15224
98	Bussum	N-236	137.090	474.810	Spikkels AW, ondateerbaar	NEO-BR	2007, cores	in top of cover sands, below peat sequence	Archis	2165724100 / 411524
99	Muiderberg	Googweg	135.840	481.892	1 flint cut-off	PALEOL-MESO	2016, cores		Archis	4016777100
100	Muiderberg	- (strand)	136.760	482.423	1 flint tool, 'keilmesser'-like	PALEOM	1974	May be supplied?	Archis	2689130100 / 438956
101	Muiderberg	Brink	136.400	482.100	Follis (A3) van keizer Crispus (317-326)	ROML	detector find		Lit.	Annual report AWN-Naerdicklant 2008, 72
102	Weesp	Vecht clean-up	132.461	480.988		ROM and younger	2011, archaeological guidance of civil works		Archis	2326525100 / 439114

Legenda

 = not showed on the map, because location and/or date are not exact enough.

Archaeological periods

PALEOL = late Paleolithicum	35000-8800 BC
MESO = Mesolithicum	8800-4900 BC
NEO = Neolithicum	M = middle (4200-2850 BC); L = late (2850-2000 BC)
BR = Bronze age	M = middle (1800-1100 BC); L = late (1100-800 BC)
IJZ = Iron age	V = early (800-500 BC); M = middle (500-250 BC); L = late (250-12 BC)
ROM = Roman period	V = early (12 BC - 70 AD); M = middle (70-270 AD); L = late (270-450 AD)

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