

APPENDIX A: AERIAL PHOTOGRAPHIC ASSESSMENT

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APPENDIX 1

Aerial Photographs Consulted At the NMR

FIGURE 1 Archaeological features recorded within the Site

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1 INTRODUCTION

- 1.1 Chris Cox BA MA MIFA, of CgMs Consulting, undertook this assessment of aerial photographs during March 2003.
- 1.2 It was completed on behalf of Worcestershire County Archaeological Service, to identify and provide detailed mapping of archaeological features visible on aerial photographs within the study area at Ripple Quarry, Worcestershire.

2 THE STUDY AREA, Figure 1

2.1 Location

2.1.1 The site lies to the southwest of Ripple village on the east bank of the River Severn. It centres upon National Grid Reference SO 875365.

2.2 Soils and Geology

2.2.1 The study area is alluviated on its west side, where the land shows evidence of drainage for cultivation, with first terrace sand and gravels to its east. The well-drained soils on these areas allow the formation of marks in crops over cut buried features.

2.3 Archaeology

2.3.1 The study site and its environs contain evidence for prehistoric, Iron Age, Roman and Medieval land use and settlement. There is a Roman site at Ripple, and an Iron Age fort 500m to the east of the study area at Towbury Hill. Traces of Medieval farming and settlement may be discerned to the west of the area across the river, and at least part of the study area was cultivated in the Medieval period.

2.3.2 The site shows clear evidence for past occupation, and is likely to have been settled and farmed in later prehistory or during the Roman occupation.

2.4 Land-use and condition

2.4.1 The area is relatively level and lies partially within the alluviated floodplain of the River Severn. The majority of the area is in arable cultivation. Features contained within the top and sub soils may be heavily eroded.

3 ARCHAEOLOGY FROM AERIAL PHOTOGRAPHS

3.1 The role of aerial photographic interpretation

- 3.1.1 Air photo interpretation provides a unique overview of landscape history and changes in land-use. It provides informed guidance for subsequent desk and ground-based investigations and complements cartographic and documentary research.
- 3.1.2 Information gained from aerial photographs cannot easily be detected by other means and the interpretation of contemporary and archival aerial photographs is thus an important component of multi-disciplinary archaeological investigation.
- 3.1.3 Interpretation of aerial photographs allows the accurate mapping of archaeological sites recorded as crop, grass or vegetation marks (caused by the differential growth of plants over buried features); soil marks (caused by differences in soil colour over ploughed buried features) and shadows cast by upstanding earthworks and features seen in relief. In this instance, features were seen as positive marks in crops and grass.

3.2 Limitations of the data

- 3.2.1 Aerial photographic evidence is limited by seasonal, agricultural, meteorological and environmental factors which affect the extent to which either buried or upstanding archaeological features can be detected. It is thus advantageous to examine a range of photos taken under a variety of environmental conditions in order to build up a comprehensive interpretation of the archaeological landscape.
- 3.2.2 The visibility of archaeological features may differ from year to year. Individual photographs thus often record only a small percentage of the actual extent of buried or upstanding features. In this case, I consider that the buried features which show as crop marks are likely to be much more extensive in both area and complexity than shown by existing aerial photographs. Alluviated areas will not show marks in crop over features buried deep within the alluvial deposits.

4 AERIAL PHOTOGRAPHS: TYPES AND SOURCES

4.1 Types

- 4.1.1 Two types of aerial photograph are used for archaeological interpretation. Vertical aerial photographs are taken for general-purpose survey using a camera mounted inside a modified aircraft. The aircraft is flown on a pre-planned set of overlapping flight-lines which cover the survey area completely. The camera points straight towards the ground. The vertical viewpoint provides aerial photographic coverage from a fixed scale and constant 180° angles at the centre of each frame. The overlap between the areas covered by each consecutive frame is usually 60%. This overlap between frames enables the photo interpreter to study each pair of vertical photos under a stereoscope.
- 4.1.2 The stereoscope combines the two images to allow the interpreter to see one three-dimensional image of the ground surface. Vertical aerial photographs carry inherent distortions introduced by variations in perspective and ground height, but are essentially ‘map-like’ in appearance. They are generally taken for non-archaeological, civil and military purposes and form the basic data from which most modern maps are compiled. Vertical aerial photographs are a very useful source of archaeological data, particularly in areas where features survive as earthworks. They also constitute historical ‘documents’.
- 4.1.3 Oblique aerial photographs are taken using a hand held camera by an aerial archaeologist to portray features which have been identified during specialist survey. These photos are extremely useful, but contain inherent perspective distortions, which must be accounted for in rectification and mapping procedures. All features recorded during this assessment were interpreted from oblique aerial photographs, and supplementary data were derived from verticals.

4.2 Sources of data

- 4.2.1 Vertical and oblique aerial photographs taken between 1946 and 2000 were interpreted. These are archived at the English Heritage National Monuments Record (NMR - EH Coversearch number AP 53788, 20-02-03, at Appendix 1) and at Worcestershire SMR.

5 INTERPRETATION AND MAPPING METHODOLOGY

- 5.1 Photographic interpretation, rectification and mapping were carried out following procedures defined by IFA Technical Paper Number 12. All photographs were closely examined, under 1.5x and 4x magnification and interpreted with the aid of a mirror stereoscope where appropriate.
- 5.2 Transparent interpretative overlays were prepared, from which archaeological and associated relevant data were scanned for rectification to the map base.
- 5.3 Interpreted features were rectified, where appropriate, by computer using ortho-photo rectification software, AirPhoto 2.17. This software calculates values for the closeness of control point match between the photograph and an accurately surveyed digital map base. It utilises an initial plane surface mathematical rectification technique to match photo and map data.
- 5.4 The mean error value of the control points when matched to the map was less than 1.8m in all cases, which is acceptable when matching to maps surveyed at 1:2500 scale.

6 MAPS

- 6.1 Aerial photographic data were rectified to an OS digital map base. This base was used for geo-referencing and presentation of the results in both digital and paper formats.
- 6.2 The mapping was produced using AutoCAD Map Release 14 and 2000 and may be exported as required subject to checking of complete data transfer and positional accuracy by the client.

7 RESULTS Figure 1

7.1 The following features were identified within the Site:

Feature A

NGR	SO 866373
Photo number	WSM 05737 J. Pickering
Location	East bank of River Severn

Oblique aerial photos, which cover a buried enclosure to the immediate west, also record traces of possible pits at Location A.

These features are very faint, and may be natural anomalies. They did not show on any other photographs.

Feature B

NGR	SO 868374
Photo number	WSM 05737 J. Pickering
Location	Between Silvermead and River Severn

Marks in crop or grass at Location B show traces of buried enclosures and possible cut curvilinear features. These are highly likely to be of archaeological origin – probably a stock penning or settlement enclosure. Two wide dark features on either side of the enclosure may be associated, or may be traces of later drainage or other cultivation land use.

Feature C

NGR SO 871373

Photo number WSM 01343, J. Pickering

Location West of Silvermead

Definite traces of an incompletely visible buried ditched enclosure, fragment of a possible further enclosure and a pit. These features show as positive marks in crops and pre-date the modern landscape.

The field to the immediate north of the enclosure contains crop-marked traces of a ploughed-out Medieval ridge and furrow.

Feature D

NGR SO 875367

Photo number SO8736/37

Location Between Bow Farm and Ripple Lake

Extensive traces of a probable later prehistoric site show at this location, which also contains feature D, a later system of ditched boundaries. These boundaries were not extant in the 1940s.

Feature E

NGR SO 875366

Photo number SO8736/37

Location Between Bow Farm and Ripple Lake

Extensive traces of a probable later prehistoric site show at this location, which also contains features at E, which comprise a double ditched probably rutted track or road way and a similarly aligned row of closely spaced pits, indicative of a former boundary or fence line.

The trackway is bounded by double ditches and shows further ditches in its interior, which probably reflect a well-used and rutted surface. It is likely to have been in use at the same time as the pit alignment.

Feature F

NGR SO 873368

Photo number SO8736/37

Location Between Bow Farm and Ripple Lake

Sinuuous and linear ditches with associated complexes of ditched enclosures. The enclosures contain multiple pits and internal and external features. Although they are the subject of extensive photographic coverage, and have been seen as crop marks over a number of years, their extent and morphology has never been seen very clearly.

It is obvious that these features represent a very dense and complex area of past settlement which comprises ditched enclosures, and is likely to have been a farmstead with associated trackways, and land boundaries such as those seen to its immediate south.

The entire area within and around these enclosures contains many minor cut features and areas of dense pits, indicative of extensive past landuse and possibly a long period of occupation.

Feature G

NGR SO 876364

Photo number J.Pickering

Location Between Bow Farm and Ripple Lake

Traces of ploughed out broad ridge and furrow indicative of Medieval agriculture.

Feature H

NGR SO 876362

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

Photo number 1:2500 scale vertical (WSM)

Location East of Ripple Lake

Faint traces of linear features which show as marks in grass or crop. These may be agricultural features, but their regularity suggests a possible archaeological significance, given the proximity of a definite ancient trackway to the immediate north.

8 CONCLUSION

- 8.1 The study area contains a very extensive complex of possible Iron Age settlement remains, which comprise enclosure, pits, tracks and boundaries. Further enclosures to the north may be contemporary.
- 8.2 The area was thus settled and farmed in later prehistory, as attested by the proximity of a hill-fort structure at Towbury.
- 8.3 Farming obviously continued into the Medieval period.
- 8.4 It is likely that the archaeological features recorded as crop marks are more extensive than shown on the aerial photos, and may continue beneath the alluvium.

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

Appendix 1: Aerial Photographs consulted at EH

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

ENGLISH HERITAGE - NATIONAL MONUMENTS RECORD
National Monuments Record - Air Photos Library

Summary report for specialist collection

Date : 20-Feb-2003 Time : 12:45:24

Customer Enquiry Reference No. 53788

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details	Date Flown	DF	6 Fig NGR	
S08536/10	NMR 18986	18		EHC	NMR	B 35 mm	Colour neg	14-DEC-2000	1	S0858368
S08635/1	HAW 9388	47	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0866358
S08635/2	HAW 9388	48	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0866358
S08636/1	HAW 9388	51	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0863361
S08636/2	HAW 9388	49	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0863361
S08636/3	HAW 9388	50	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0862361
S08636/4	HAW 9388	52	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0862361
S08636/5	HAW 9388	53	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0862361
S08636/23	NMR 21083	07		EHC	NMR	B 70mm,120,220	Black& white	14-DEC-2000	1	S0865369
S08636/24	NMR 21083	08		EHC	NMR	B 70mm,120,220	Black& white	14-DEC-2000	1	S0865369
S08637/1	JAP 6932	212	89.3	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	S0869374
S08637/2	JAP 6932	213	89.3	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	S0868373
S08637/3	JAP 6932	214	89.3	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	S0867373
S08637/4	HAW 9389	04	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0863377
S08637/5	HAW 9389	05	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	S0863377
S08637/20	NMR 21083	09		EHC	NMR	B 70mm,120,220	Black& white	14-DEC-2000	1	S0869371
S08638/1	WAB 136	29		WAB	NMR	B 5x5"	Black& white	01-JUL-1969	2	S0865385
S08638/2	WAB 136	30		WAB	NMR	B 5x5"	Black& white	01-JUL-1969	2	S0865385
S08638/3	CAP 7891	14	BPX	CAP		B Unknown	Black& white	18-JUN-1974	1	S0864384
S08638/4	JAP 1728	26		JAP	NMR	B 35 mm	B&W copy clr	28-JUL-1979	1	S0865385
S08638/6	JAP 1728	27	446	JAP	NMR	B 35 mm	B&W copy clr	05-AUG-1979	1	S0865385
S08638/7	JAP 1731	07	851	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	S0865385
S08638/8	JAP 1731	08	852	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	S0865385
S08638/9	NMR 4644	03		CRW	NMR	B 70mm,120,220	Black& white	10-JUN-1990	1	S0865385
S08638/13	JAP 6933	256	89.4	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	S0864385
S08638/14	JAP 6933	257	89.4	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	S0866385
S08638/15	JAP 6968	672	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	S0865384
S08638/16	JAP 6968	673	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	S0864384

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details	Date Flown	DF	6 Fig NGR
SO8638/17	JAP 6968	674	86.21	JAP	NMR	B 35 mm Copy slide	17-JUL-1986	1	SO865385
SO8638/28	NMR 21694	21		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	SO865385
SO8638/29	NMR 21694	22		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	SO865385
SO8638/30	NMR 21694	23		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	SO865385
SO8638/31	NMR 21694	24		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	SO863384
SO8736/1	JAP 1728	22	451	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	SO875365
SO8736/2	JAP 1728	23	450	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	SO875365
SO8736/3	JAP 1728	24	449	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	SO875365
SO8736/4	JAP 1731	03	847	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO875365
SO8736/5	JAP 1731	04	848	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO875365
SO8736/6	JAP 1731	05	849	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO874367
SO8736/7	JAP 1731	06	850	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO875365
SO8736/8	JAP 1783	13		JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO875366
SO8736/9	JAP 5342	2135	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	SO872367
SO8736/10	JAP 5342	2136	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	SO872367
SO8736/11	JAP 5342	2137	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	SO874366
SO8736/12	NMR 4644	01		CRW	NMR	B 70mm,120,220 Black& white	10-JUN-1990	1	SO872367
SO8736/13	NMR 4644	02		CRW	NMR	B 70mm,120,220 Black& white	10-JUN-1990	1	SO872367
SO8736/14	JAP 6984	244	87.37	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	SO873368
SO8736/15	JAP 6932	215	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO871368
SO8736/16	JAP 6932	216	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO873367
SO8736/17	JAP 6932	217	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO873367
SO8736/18	JAP 6932	218	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO873367
SO8736/19	JAP 6932	219	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO874366
SO8736/20	JAP 6932	220	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872366
SO8736/21	JAP 6932	221	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872367
SO8736/22	JAP 6932	222	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872367
SO8736/23	JAP 6932	223	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872367
SO8736/24	JAP 6933	249	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO875366
SO8736/25	JAP 6933	250	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO873367
SO8736/26	JAP 6933	251	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO871367
SO8736/27	JAP 6933	251A	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO871367
SO8736/28	JAP 6933	252	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872366
SO8736/29	JAP 6933	253	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO871367
SO8736/30	JAP 6933	254	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872366
SO8736/31	JAP 6943	682	89.14	JAP	NMR	B 35 mm Copy slide	06-JUL-1989	1	SO872368
SO8736/32	JAP 6947	706	89.18	JAP	NMR	B 35 mm Copy slide	23-JUL-1989	1	SO874366

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details		Date Flown	DF	6 Fig NGR
SO8736/33	JAP 6947	707	89.18	JAP	NMR	B 35 mm	Copy slide	23-JUL-1989	1	SO874366
SO8736/34	JAP 6968	666	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO875366
SO8736/35	JAP 6968	667	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO875366
SO8736/36	FXH 14150	01	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/37	FXH 14150	02	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/38	FXH 14150	03	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/39	JAP 6972	1254	86.25	JAP	NMR	B 35 mm	Copy slide	26-JUL-1986	1	SO874366
SO8736/40	JAP 6972	1255	86.25	JAP	NMR	B 35 mm	Copy slide	26-JUL-1986	1	SO874366
SO8736/41	JAP 6980	AK	86.33	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874366
SO8736/42	JAP 6985	201	88.38	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874366
SO8736/43	JAP 6985	202	88.38	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874365
SO8737/1	JAP 6968	668	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO871373
SO8737/2	JAP 6968	669	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO871373
SO8738/1	JAP 6968	670	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO872381
SO8738/2	JAP 6968	671	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO872381
SO8738/3	HAW 9389	01	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO878381
SO8738/4	HAW 9389	02	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO878381
SO8836/4	JAP 1728	20	453	JAP	NMR	B 35 mm	B&W copy clr	05-AUG-1979	1	SO880367
SO8836/5	JAP 1728	21	452	JAP	NMR	B 35 mm	B&W copy clr	05-AUG-1979	1	SO880367
SO8836/6	JAP 1731	01	844	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	SO881367
SO8836/7	JAP 1731	02	845	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	SO881367
SO8836/8	JAP 5342	2132	40	JAP	NMR	B 35 mm	Copy slide	08-AUG-1987	1	SO881363

Total 87 Records

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

ENGLISH HERITAGE - NATIONAL MONUMENTS RECORD
National Monuments Record - Air Photos Library

Summary report for vertical coversearch

Date : 20-Feb-2003 Time : 12:47:31

Customer Enquiry Reference No. 53788

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RAF/106G/UK/1345	209	V	5082	5084	P	S0878380	S0865381	01-APR-1946	1	A	9800	20.00	BW87	MOD	RAF
RAF/106G/UK/1652	427	RP	3220	3220	P	S0857376	S0857376	11-JUL-1946	1	AB	10000	36.00	BW87	MOD	RAF
RAF/106G/UK/1652	427	V	5220	5220	P	S0855356	S0855356	11-JUL-1946	1	AB	10000	36.00	BW87	MOD	RAF
RAF/CPE/UK/1926	542	RS	4120	4122	P	S0862386	S0876381	16-JAN-1947	1	A	10000	36.00	BW87	MOD	RAF
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RAF/CPE/UK/2110	669	RS	4374	4376	P	S0873376	S0863376	28-MAY-1947	1	A	9800	20.00	BW87	MOD	RAF
RAF/540/144	967	V	5066	5075	N	S0876356	S0865379	05-JAN-1949	1	A	3400	14.00	BW87	MOD	RAF
RAF/541/429	1725	RP	3052	3057	P	S0866355	S0862378	14-FEB-1950	1	B	9600	20.00	BW87	MOD	RAF
RAF/541/429	1725	RS	4053	4056	P	S0881367	S0878381	14-FEB-1950	1	B	9600	20.00	BW87	MOD	RAF
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RAF/58/5304	2067	F22	59	60	N	S0872374	S0864367	13-JUL-1962	1	AB	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F21	34	35	P	S0874375	S0864374	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F21	37	37	P	S0876358	S0876358	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F22	37	37	P	S0864374	S0864374	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/106G/UK/1337	3360	V	5079	5080	P	S0875382	S0867382	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/106G/UK/1337	3360	V	5100	5102	P	S0857359	S0872356	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/106G/UK/1337	3360	V	5156	5157	P	S0866370	S0874370	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/13A/UK791	6407	V	154	154	P	S0862377	S0862377	09-JUL-1941	1	AB	10000	5.00	BW55	FDM	RAF
OS/64150	9369	V	17	19	P	S0861358	S0865373	22-AUG-1964	1	A	7500	12.00	BW99	NMR	CRW
OS/65117	9372	V	63	66	P	S0879355	S0878375	21-JUN-1965	1	A	7500	12.00	BW99	NMR	CRW
OS/65122	9373	V	60	64	P	S0864377	S0865354	28-JUN-1965	1	A	7500	12.00	BW99	NMR	CRW
OS/68168	9427	V	201	201	P	S0861378	S0861378	10-JUN-1968	1	A	7500	12.00	BW99	NMR	CRW
OS/83019	13016	V	9	9	P	S0869381	S0869381	09-APR-1983	1	A	7600	12.00	BW99	OS	CRW
OS/88007	13218	V	61	61	P	S0863377	S0863377	10-MAR-1988	1	A	7900	12.00	BW99	OS	CRW
OS/88007	13218	V	137	141	P	S0870355	S0877376	10-MAR-1988	1	A	7900	12.00	BW99	OS	CRW

Total 16 Sorties 69 Prints

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

ENGLISH HERITAGE - NATIONAL MONUMENTS RECORD
National Monuments Record - Air Photos Library

Summary report for specialist collection

Date : 20-Feb-2003 Time : 12:45:24

Customer Enquiry Reference No. 53788

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details	Date Flown	DF	6 Fig NGR
SO8536/10	NMR 18986	18		EHC	NMR	B 35 mm Colour neg	14-DEC-2000	1	SO858368
SO8635/1	HAW 9388	47	AB	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO866358
SO8635/2	HAW 9388	48	AB	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO866358
SO8636/1	HAW 9388	51	AB	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO863361
SO8636/2	HAW 9388	49	AB	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO863361
SO8636/3	HAW 9388	50	AB	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO862361
SO8636/4	HAW 9388	52	AB	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO862361
SO8636/5	HAW 9388	53	AB	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO862361
SO8636/23	NMR 21083	07		EHC	NMR	B 70mm,120,220 Black& white	14-DEC-2000	1	SO865369
SO8636/24	NMR 21083	08		EHC	NMR	B 70mm,120,220 Black& white	14-DEC-2000	1	SO865369
SO8637/1	JAP 6932	212	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO869374
SO8637/2	JAP 6932	213	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO868373
SO8637/3	JAP 6932	214	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO867373
SO8637/4	HAW 9389	04	AC	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO863377
SO8637/5	HAW 9389	05	AC	CRW	NMR	B Sheet film Black& white	16-AUG-1958	1	SO863377
SO8637/20	NMR 21083	09		EHC	NMR	B 70mm,120,220 Black& white	14-DEC-2000	1	SO869371
SO8638/1	WAB 136	29		WAB	NMR	B 5x5" Black& white	01-JUL-1969	2	SO865385
SO8638/2	WAB 136	30		WAB	NMR	B 5x5" Black& white	01-JUL-1969	2	SO865385
SO8638/3	CAP 7891	14	BPX	CAP		B Unknown Black& white	18-JUN-1974	1	SO864384
SO8638/4	JAP 1728	26		JAP	NMR	B 35 mm B&W copy clr	28-JUL-1979	1	SO865385
SO8638/6	JAP 1728	27	446	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	SO865385
SO8638/7	JAP 1731	07	851	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO865385
SO8638/8	JAP 1731	08	852	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO865385
SO8638/9	NMR 4644	03		CRW	NMR	B 70mm,120,220 Black& white	10-JUN-1990	1	SO865385
SO8638/13	JAP 6933	256	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO864385
SO8638/14	JAP 6933	257	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO866385
SO8638/15	JAP 6968	672	86.21	JAP	NMR	B 35 mm Copy slide	17-JUL-1986	1	SO865384
SO8638/16	JAP 6968	673	86.21	JAP	NMR	B 35 mm Copy slide	17-JUL-1986	1	SO864384

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details	Date Flown	DF	6 Fig NGR
SO8638/17	JAP 6968	674	86.21	JAP	NMR	B 35 mm Copy slide	17-JUL-1986	1	SO865385
SO8638/28	NMR 21694	21		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	SO865385
SO8638/29	NMR 21694	22		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	SO865385
SO8638/30	NMR 21694	23		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	SO865385
SO8638/31	NMR 21694	24		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	SO863384
SO8736/1	JAP 1728	22	451	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	SO875365
SO8736/2	JAP 1728	23	450	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	SO875365
SO8736/3	JAP 1728	24	449	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	SO875365
SO8736/4	JAP 1731	03	847	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO875365
SO8736/5	JAP 1731	04	848	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO875365
SO8736/6	JAP 1731	05	849	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO874367
SO8736/7	JAP 1731	06	850	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO875365
SO8736/8	JAP 1783	13		JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	SO875366
SO8736/9	JAP 5342	2135	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	SO872367
SO8736/10	JAP 5342	2136	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	SO872367
SO8736/11	JAP 5342	2137	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	SO874366
SO8736/12	NMR 4644	01		CRW	NMR	B 70mm,120,220 Black& white	10-JUN-1990	1	SO872367
SO8736/13	NMR 4644	02		CRW	NMR	B 70mm,120,220 Black& white	10-JUN-1990	1	SO872367
SO8736/14	JAP 6984	244	87.37	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	SO873368
SO8736/15	JAP 6932	215	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO871368
SO8736/16	JAP 6932	216	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO873367
SO8736/17	JAP 6932	217	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO873367
SO8736/18	JAP 6932	218	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO873367
SO8736/19	JAP 6932	219	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO874366
SO8736/20	JAP 6932	220	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872366
SO8736/21	JAP 6932	221	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872367
SO8736/22	JAP 6932	222	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872367
SO8736/23	JAP 6932	223	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872367
SO8736/24	JAP 6933	249	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO875366
SO8736/25	JAP 6933	250	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO873367
SO8736/26	JAP 6933	251	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO871367
SO8736/27	JAP 6933	251A	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO871367
SO8736/28	JAP 6933	252	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872366
SO8736/29	JAP 6933	253	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO871367
SO8736/30	JAP 6933	254	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	SO872366
SO8736/31	JAP 6943	682	89.14	JAP	NMR	B 35 mm Copy slide	06-JUL-1989	1	SO872368
SO8736/32	JAP 6947	706	89.18	JAP	NMR	B 35 mm Copy slide	23-JUL-1989	1	SO874366

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details		Date Flown	DF	6 Fig NGR
SO8736/33	JAP 6947	707	89.18	JAP	NMR	B 35 mm	Copy slide	23-JUL-1989	1	SO874366
SO8736/34	JAP 6968	666	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO875366
SO8736/35	JAP 6968	667	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO875366
SO8736/36	FXH 14150	01	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/37	FXH 14150	02	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/38	FXH 14150	03	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/39	JAP 6972	1254	86.25	JAP	NMR	B 35 mm	Copy slide	26-JUL-1986	1	SO874366
SO8736/40	JAP 6972	1255	86.25	JAP	NMR	B 35 mm	Copy slide	26-JUL-1986	1	SO874366
SO8736/41	JAP 6980	AK	86.33	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874366
SO8736/42	JAP 6985	201	88.38	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874366
SO8736/43	JAP 6985	202	88.38	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874365
SO8737/1	JAP 6968	668	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO871373
SO8737/2	JAP 6968	669	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO871373
SO8738/1	JAP 6968	670	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO872381
SO8738/2	JAP 6968	671	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO872381
SO8738/3	HAW 9389	01	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO878381
SO8738/4	HAW 9389	02	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO878381
SO8836/4	JAP 1728	20	453	JAP	NMR	B 35 mm	B&W copy clr	05-AUG-1979	1	SO880367
SO8836/5	JAP 1728	21	452	JAP	NMR	B 35 mm	B&W copy clr	05-AUG-1979	1	SO880367
SO8836/6	JAP 1731	01	844	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	SO881367
SO8836/7	JAP 1731	02	845	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	SO881367
SO8836/8	JAP 5342	2132	40	JAP	NMR	B 35 mm	Copy slide	08-AUG-1987	1	SO881363

Total 87 Records

Ripple Quarry Worcestershire, Aerial Photographic Interpretation.

ENGLISH HERITAGE - NATIONAL MONUMENTS RECORD
National Monuments Record - Air Photos Library

Summary report for vertical coversearch

Date : 20-Feb-2003 Time : 12:47:31

Customer Enquiry Reference No. 53788

Sortie Number	Library Number	Cam Pos	Start Frame	End Frame	Held	National Start	Reference End	Date	Date Flag	Qual ity	Scale 1:	Focal Length	Format	Repos itory	Copy Right
RAF/106G/UK/1345	209	V	5082	5084	P	S0878380	S0865381	01-APR-1946	1	A	9800	20.00	BW87	MOD	RAF
RAF/106G/UK/1652	427	RP	3220	3220	P	S0857376	S0857376	11-JUL-1946	1	AB	10000	36.00	BW87	MOD	RAF
RAF/106G/UK/1652	427	V	5220	5220	P	S0855356	S0855356	11-JUL-1946	1	AB	10000	36.00	BW87	MOD	RAF
RAF/CPE/UK/1926	542	RS	4120	4122	P	S0862386	S0876381	16-JAN-1947	1	A	10000	36.00	BW87	MOD	RAF
RAF/CPE/UK/2110	669	RP	3374	3376	P	S0875358	S0864358	28-MAY-1947	1	A	9800	20.00	BW87	MOD	RAF
RAF/CPE/UK/2110	669	RS	4374	4376	P	S0873376	S0863376	28-MAY-1947	1	A	9800	20.00	BW87	MOD	RAF
RAF/540/144	967	V	5066	5075	N	S0876356	S0865379	05-JAN-1949	1	A	3400	14.00	BW87	MOD	RAF
RAF/541/429	1725	RP	3052	3057	P	S0866355	S0862378	14-FEB-1950	1	B	9600	20.00	BW87	MOD	RAF
RAF/541/429	1725	RS	4053	4056	P	S0881367	S0878381	14-FEB-1950	1	B	9600	20.00	BW87	MOD	RAF
RAF/58/5304	2067	F21	52	52	N	S0876352	S0876352	13-JUL-1962	1	AB	10000	24.00	BW99	MOD	CRW
RAF/58/5304	2067	F22	59	60	N	S0872374	S0864367	13-JUL-1962	1	AB	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F21	34	35	P	S0874375	S0864374	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F21	37	37	P	S0876358	S0876358	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F22	37	37	P	S0864374	S0864374	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/106G/UK/1337	3360	V	5079	5080	P	S0875382	S0867382	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/106G/UK/1337	3360	V	5100	5102	P	S0857359	S0872356	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/106G/UK/1337	3360	V	5156	5157	P	S0866370	S0874370	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/13A/UK791	6407	V	154	154	P	S0862377	S0862377	09-JUL-1941	1	AB	10000	5.00	BW55	FDM	RAF
OS/64150	9369	V	17	19	P	S0861358	S0865373	22-AUG-1964	1	A	7500	12.00	BW99	NMR	CRW
OS/65117	9372	V	63	66	P	S0879355	S0878375	21-JUN-1965	1	A	7500	12.00	BW99	NMR	CRW
OS/65122	9373	V	60	64	P	S0864377	S0865354	28-JUN-1965	1	A	7500	12.00	BW99	NMR	CRW
OS/68168	9427	V	201	201	P	S0861378	S0861378	10-JUN-1968	1	A	7500	12.00	BW99	NMR	CRW
OS/83019	13016	V	9	9	P	S0869381	S0869381	09-APR-1983	1	A	7600	12.00	BW99	OS	CRW
OS/88007	13218	V	61	61	P	S0863377	S0863377	10-MAR-1988	1	A	7900	12.00	BW99	OS	CRW
OS/88007	13218	V	137	141	P	S0870355	S0877376	10-MAR-1988	1	A	7900	12.00	BW99	OS	CRW

Total 16 Sorties 69 Prints

ENGLISH HERITAGE - NATIONAL MONUMENTS RECORD
National Monuments Record - Air Photos Library

Summary report for specialist collection

Date : 20-Feb-2003 Time : 12:45:24

Customer Enquiry Reference No. 53788

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details	Date Flown	DF	6 Fig NGR	
SO8536/10	NMR 18986	18		EHC	NMR	B 35 mm	Colour neg	14-DEC-2000	1	SO858368
SO8635/1	HAW 9388	47	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO866358
SO8635/2	HAW 9388	48	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO866358
SO8636/1	HAW 9388	51	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO863361
SO8636/2	HAW 9388	49	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO863361
SO8636/3	HAW 9388	50	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO862361
SO8636/4	HAW 9388	52	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO862361
SO8636/5	HAW 9388	53	AB	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO862361
SO8636/23	NMR 21083	07		EHC	NMR	B 70mm,120,220	Black& white	14-DEC-2000	1	SO865369
SO8636/24	NMR 21083	08		EHC	NMR	B 70mm,120,220	Black& white	14-DEC-2000	1	SO865369
SO8637/1	JAP 6932	212	89.3	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	SO869374
SO8637/2	JAP 6932	213	89.3	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	SO868373
SO8637/3	JAP 6932	214	89.3	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	SO867373
SO8637/4	HAW 9389	04	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO863377
SO8637/5	HAW 9389	05	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO863377
SO8637/20	NMR 21083	09		EHC	NMR	B 70mm,120,220	Black& white	14-DEC-2000	1	SO869371
SO8638/1	WAB 136	29		WAB	NMR	B 5x5"	Black& white	01-JUL-1969	2	SO865385
SO8638/2	WAB 136	30		WAB	NMR	B 5x5"	Black& white	01-JUL-1969	2	SO865385
SO8638/3	CAP 7891	14	BPX	CAP		B Unknown	Black& white	18-JUN-1974	1	SO864384
SO8638/4	JAP 1728	26		JAP	NMR	B 35 mm	B&W copy clr	28-JUL-1979	1	SO865385
SO8638/6	JAP 1728	27	446	JAP	NMR	B 35 mm	B&W copy clr	05-AUG-1979	1	SO865385
SO8638/7	JAP 1731	07	851	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	SO865385
SO8638/8	JAP 1731	08	852	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	SO865385
SO8638/9	NMR 4644	03		CRW	NMR	B 70mm,120,220	Black& white	10-JUN-1990	1	SO865385
SO8638/13	JAP 6933	256	89.4	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	SO864385
SO8638/14	JAP 6933	257	89.4	JAP	NMR	B 35 mm	Copy slide	23-JUN-1989	1	SO866385
SO8638/15	JAP 6968	672	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO865384
SO8638/16	JAP 6968	673	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO864384

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details	Date Flown	DF	6 Fig NGR
S08638/17	JAP 6968	674	86.21	JAP	NMR	B 35 mm Copy slide	17-JUL-1986	1	S0865385
S08638/28	NMR 21694	21		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	S0865385
S08638/29	NMR 21694	22		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	S0865385
S08638/30	NMR 21694	23		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	S0865385
S08638/31	NMR 21694	24		EHC	NMR	B 70mm,120,220 Black& white	15-JUL-2002	1	S0863384
S08736/1	JAP 1728	22	451	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	S0875365
S08736/2	JAP 1728	23	450	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	S0875365
S08736/3	JAP 1728	24	449	JAP	NMR	B 35 mm B&W copy clr	05-AUG-1979	1	S0875365
S08736/4	JAP 1731	03	847	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	S0875365
S08736/5	JAP 1731	04	848	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	S0875365
S08736/6	JAP 1731	05	849	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	S0874367
S08736/7	JAP 1731	06	850	JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	S0875365
S08736/8	JAP 1783	13		JAP	NMR	B 35 mm B&W copy clr	21-JUL-1979	1	S0875366
S08736/9	JAP 5342	2135	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	S0872367
S08736/10	JAP 5342	2136	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	S0872367
S08736/11	JAP 5342	2137	40	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	S0874366
S08736/12	NMR 4644	01		CRW	NMR	B 70mm,120,220 Black& white	10-JUN-1990	1	S0872367
S08736/13	NMR 4644	02		CRW	NMR	B 70mm,120,220 Black& white	10-JUN-1990	1	S0872367
S08736/14	JAP 6984	244	87.37	JAP	NMR	B 35 mm Copy slide	08-AUG-1987	1	S0873368
S08736/15	JAP 6932	215	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0871368
S08736/16	JAP 6932	216	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0873367
S08736/17	JAP 6932	217	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0873367
S08736/18	JAP 6932	218	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0873367
S08736/19	JAP 6932	219	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0874366
S08736/20	JAP 6932	220	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0872366
S08736/21	JAP 6932	221	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0872367
S08736/22	JAP 6932	222	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0872367
S08736/23	JAP 6932	223	89.3	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0872367
S08736/24	JAP 6933	249	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0875366
S08736/25	JAP 6933	250	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0873367
S08736/26	JAP 6933	251	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0871367
S08736/27	JAP 6933	251A	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0871367
S08736/28	JAP 6933	252	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0872366
S08736/29	JAP 6933	253	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0871367
S08736/30	JAP 6933	254	89.4	JAP	NMR	B 35 mm Copy slide	23-JUN-1989	1	S0872366
S08736/31	JAP 6943	682	89.14	JAP	NMR	B 35 mm Copy slide	06-JUL-1989	1	S0872368
S08736/32	JAP 6947	706	89.18	JAP	NMR	B 35 mm Copy slide	23-JUL-1989	1	S0874366

NGR Index Number	Accession Number	Frame	Original Number	Copy right	Repos itory	Film Details		Date Flown	DF	6 Fig NGR
SO8736/33	JAP 6947	707	89.18	JAP	NMR	B 35 mm	Copy slide	23-JUL-1989	1	SO874366
SO8736/34	JAP 6968	666	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO875366
SO8736/35	JAP 6968	667	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO875366
SO8736/36	FXH 14150	01	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/37	FXH 14150	02	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/38	FXH 14150	03	92.16	FXH	FXH	B 70mm,120,220	Black& white	07-JUL-1992	1	SO874367
SO8736/39	JAP 6972	1254	86.25	JAP	NMR	B 35 mm	Copy slide	26-JUL-1986	1	SO874366
SO8736/40	JAP 6972	1255	86.25	JAP	NMR	B 35 mm	Copy slide	26-JUL-1986	1	SO874366
SO8736/41	JAP 6980	AK	86.33	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874366
SO8736/42	JAP 6985	201	88.38	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874366
SO8736/43	JAP 6985	202	88.38	JAP	NMR	B 35 mm	Copy slide	23-JUL-1988	1	SO874365
SO8737/1	JAP 6968	668	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO871373
SO8737/2	JAP 6968	669	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO871373
SO8738/1	JAP 6968	670	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO872381
SO8738/2	JAP 6968	671	86.21	JAP	NMR	B 35 mm	Copy slide	17-JUL-1986	1	SO872381
SO8738/3	HAW 9389	01	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO878381
SO8738/4	HAW 9389	02	AC	CRW	NMR	B Sheet film	Black& white	16-AUG-1958	1	SO878381
SO8836/4	JAP 1728	20	453	JAP	NMR	B 35 mm	B&W copy clr	05-AUG-1979	1	SO880367
SO8836/5	JAP 1728	21	452	JAP	NMR	B 35 mm	B&W copy clr	05-AUG-1979	1	SO880367
SO8836/6	JAP 1731	01	844	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	SO881367
SO8836/7	JAP 1731	02	845	JAP	NMR	B 35 mm	B&W copy clr	21-JUL-1979	1	SO881367
SO8836/8	JAP 5342	2132	40	JAP	NMR	B 35 mm	Copy slide	08-AUG-1987	1	SO881363

Total 87 Records

ENGLISH HERITAGE - NATIONAL MONUMENTS RECORD
National Monuments Record - Air Photos Library

Summary report for vertical coversearch

Date : 20-Feb-2003 Time : 12:47:31

Customer Enquiry Reference No. 53788

Sortie Number	Library Number	Cam Pos	Start Frame	End Frame	Held	National Start	Reference End	Date	Date Flag	Qual ity	Scale 1:	Focal Length	Format	Repos itory	Copy Rght
RAF/106G/UK/1345	209	V	5082	5084	P	S0878380	S0865381	01-APR-1946	1	A	9800	20.00	BW87	MOD	RAF
RAF/106G/UK/1652	427	RP	3220	3220	P	S0857376	S0857376	11-JUL-1946	1	AB	10000	36.00	BW87	MOD	RAF
RAF/106G/UK/1652	427	V	5220	5220	P	S0855356	S0855356	11-JUL-1946	1	AB	10000	36.00	BW87	MOD	RAF
RAF/CPE/UK/1926	542	RS	4120	4122	P	S0862386	S0876381	16-JAN-1947	1	A	10000	36.00	BW87	MOD	RAF
RAF/CPE/UK/2110	669	RP	3374	3376	P	S0875358	S0864358	28-MAY-1947	1	A	9800	20.00	BW87	MOD	RAF
RAF/CPE/UK/2110	669	RS	4374	4376	P	S0873376	S0863376	28-MAY-1947	1	A	9800	20.00	BW87	MOD	RAF
RAF/540/144	967	V	5066	5075	N	S0876356	S0865379	05-JAN-1949	1	A	3400	14.00	BW87	MOD	RAF
RAF/541/429	1725	RP	3052	3057	P	S0866355	S0862378	14-FEB-1950	1	B	9600	20.00	BW87	MOD	RAF
RAF/541/429	1725	RS	4053	4056	P	S0881367	S0878381	14-FEB-1950	1	B	9600	20.00	BW87	MOD	RAF
RAF/58/5304	2067	F21	52	52	N	S0876352	S0876352	13-JUL-1962	1	AB	10000	24.00	BW99	MOD	CRW
RAF/58/5304	2067	F22	59	60	N	S0872374	S0864367	13-JUL-1962	1	AB	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F21	34	35	P	S0874375	S0864374	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F21	37	37	P	S0876358	S0876358	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/58/5516	2120	F22	37	37	P	S0864374	S0864374	17-OCT-1962	1	A	10000	24.00	BW99	MOD	CRW
RAF/106G/UK/1337	3360	V	5079	5080	P	S0875382	S0867382	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/106G/UK/1337	3360	V	5100	5102	P	S0857359	S0872356	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/106G/UK/1337	3360	V	5156	5157	P	S0866370	S0874370	29-MAR-1946	1	BC	10200	20.00	BW87	MOD	RAF
RAF/13A/UK791	6407	V	154	154	P	S0862377	S0862377	09-JUL-1941	1	AB	10000	5.00	BW55	FDM	RAF
OS/64150	9369	V	17	19	P	S0861358	S0865373	22-AUG-1964	1	A	7500	12.00	BW99	NMR	CRW
OS/65117	9372	V	63	66	P	S0879355	S0878375	21-JUN-1965	1	A	7500	12.00	BW99	NMR	CRW
OS/65122	9373	V	60	64	P	S0864377	S0865354	28-JUN-1965	1	A	7500	12.00	BW99	NMR	CRW
OS/68168	9427	V	201	201	P	S0861378	S0861378	10-JUN-1968	1	A	7500	12.00	BW99	NMR	CRW
OS/83019	13016	V	9	9	P	S0869381	S0869381	09-APR-1983	1	A	7600	12.00	BW99	OS	CRW
OS/88007	13218	V	61	61	P	S0863377	S0863377	10-MAR-1988	1	A	7900	12.00	BW99	OS	CRW
OS/88007	13218	V	137	141	P	S0870355	S0877376	10-MAR-1988	1	A	7900	12.00	BW99	OS	CRW

Total 16 Sorties 69 Prints

FIGURE 1

Archaeological features recorded from aerial photographs



FIGURE 1

RIPPLE QUARRY, WORCESTERSHIRE
INTERPRETATION OF AERIAL PHOTOGRAPHS

- Cut archaeological features
- Possible archaeological features
- - - Areas of former ridge and furrow
- Former, more modern, boundaries