

A. Title Page

Final Report: **VR003 (Varsche Rivier 003) Sector I lithic and faunal export**

Permit Numbers: **2089 (& extension 2354)**

SAHRIS Case ID: **8015**

Authors of report: **Teresa E. Steele & Alex Mackay**

Date of report: **14 May 2021**

Name of SAHRA permit officers on permit: **Ragna Rederlstorff & Phillip Hine**

Date of permit issue: **31 August 2015 (2089) & 16 August 2016 (2354)**

Report due date: **30 September 2017**

Expiry date of permit: **30 September 2017**

Permit Holder: **Jayson Orton, ASHA Consulting (Pty) Ltd**

Permit To: **Teresa Steele, University of California, Davis**

Name of locality/site: **Varsche Rivier 003**

Object ID's: **VR003-Faunal Material-BATCH-CASEID8015**

B. Executive Summary

We requested and were granted (Case ID 8015, Permit ID 2089) the temporary export of fauna and stone artifacts excavated from Varsche Rivier [(VR)003 on farm Varsche Rivier, Matzikama], Western Cape Province. These were materials from archaeological horizons I-08 and I-09 of our 2014 and 2015 excavations, which were to be analyzed by the applicants Prof. Teresa E Steele (U California, Davis) and A/Prof Alex Mackay (U Wollongong) at our home institutions. The permit was valid from 31 August 2015 to 30 September 2016. The export was extended for one year (Case ID 8015, Permit ID 2354) until 30 September 2017. All exported materials were analyzed, curated, and returned. Following the guidelines set out in the permit, all materials were returned via air courier (FedEx) in two emparcments each, funded by Steele's US National Science Foundation grant. The results of analysis are described in two submitted manuscripts appended to this application, and summarised in the tables below. Preliminary ages suggest that the assemblage accumulated approximately 90-80 000 years before present.

Scientific name	Common name	NISP	MNI
<i>Procavia capensis</i>	rock hyrax (dassie)	1	1
<i>Bathyergus suillus</i>	Cape dune mole-rat	1	1
<i>Hystrix africaeaustralis</i>	Cape porcupine	1	1
<i>Felis silvestris libyca</i>	African wild cat	8	1
<i>Mellivora capensis</i>	honey badger (ratel)	1	1
<i>Equus capensis</i>	Cape zebra	1	1
<i>Taurotragus oryx</i>	eland	5	2
<i>Raphicerus</i> sp(p.)	grysbok/steenbok	4	1
	small bovid(s)	63	1
	small-medium bovid(s)	34	1
	large-medium bovid(s)	32	1
	large bovid(s)	15	1
Aves	birds	3	1
Testudinidae	tortoises	352	21
Serpentes	snakes	3	1
	Total	524	

Table 1. Terrestrial faunal remains. The bovid species counts are based on dental remains, and those counts are not included in the body-size categories. When possible to identify, the Testudinidae are *Chersina angulate*, with the exception of one humerus which was not.

Scientific name	Common name	NISP	MNI	Weight (g)	# Burnt
<i>Choromytilus meridionalis</i>	black mussel	2	1	0.3	1
<i>Cymbula granatina</i>	granite limpet	13	2	45.2	0
<i>Scutellastra argenvillei</i>	Argenville's limpet	3	1	12.7	2
	limpet	4	1	1.5	4
	mollusk	4	1	1.2	1
Total		26			

Table 2. Marine shell remains. Weight in grams and number of burnt specimens are also included. When MNI counts exceed one, they are based on the apices of the limpets.

	silcrete	quartz	quartzite	hornfels	chert	other	total	%
<i>flakes</i>	813	712	554	76	66	26	2247	73.4
<i>retouched flakes</i>	29	44	18	10	4	1	106	3.5
<i>cores</i>	72	25	13	3	4	0	117	3.8
<i>flaked pieces</i>	67	119	26	4	7	8	231	7.5
<i>heat shatter</i>	313	9	20	8	5	6	361	11.8
<i>total</i>	1294	909	631	101	86	41	3062	
<i>%</i>	41.6	29.8	20.9	3.3	2.9	1.4		100.0

Table 3. Lithic assemblage primary classes.

	silcrete	quartz	quartzite	hornfels	chert	other	total	%
<i>flakes</i>	434	323	269	37	35	14	1111	88.7
<i>blades</i>	36	14	20	10	3	0	83	6.6
<i>points</i>	24	8	20	3	4	0	59	4.7
<i>total</i>	494	345	309	50	42	14	1253	

Table 4. Numbers of different flake types divided by raw material, complete flakes only.

	silcrete	quartz	quartzite	hornfels	chert	Other	total
<i>Denticulate</i>	2	5	2	0	0	0	9
<i>Notch, simple</i>	3	4	6	2	0	0	15
<i>Notch, complex</i>	2	1	0	1	0	0	4
<i>Scaled piece</i>	0	1	1	2	0	0	4
<i>Scraper</i>	1	3	0	0	0	0	4
<i>Other</i>	12	10	2	0	2	1	27
<i>total</i>	20	24	11	5	2	1	63

Table 5. Retouched flake types by raw material.

	silcrete	quartz	quartzite	hornfels	chert	Other	total
<i>Bipolar</i>	0	1	0	0	0	1	2
<i>Discooidal</i>	3	1	1	0	0	0	5
<i>Levallois, preferential</i>	3	1	2	0	0	0	6
<i>Levallois, recurrent</i>	5	0	1	1	1	0	8
<i>Other prepared</i>	15	5	3	1	0	0	24
<i>Platform</i>	10	3	1	0	1	0	16
<i>Rotated</i>	4	1	1	0	0	0	6
<i>No type</i>	13	8	3	0	1	0	24
<i>total</i>	53	20	12	2	3	1	91

Table 6. Core types by raw material.

C. SAHRIS Object or Site Links

Permit:

<https://sahris.sahra.org.za/node/325364>

<https://sahris.sahra.org.za/node/368375>

Objects:

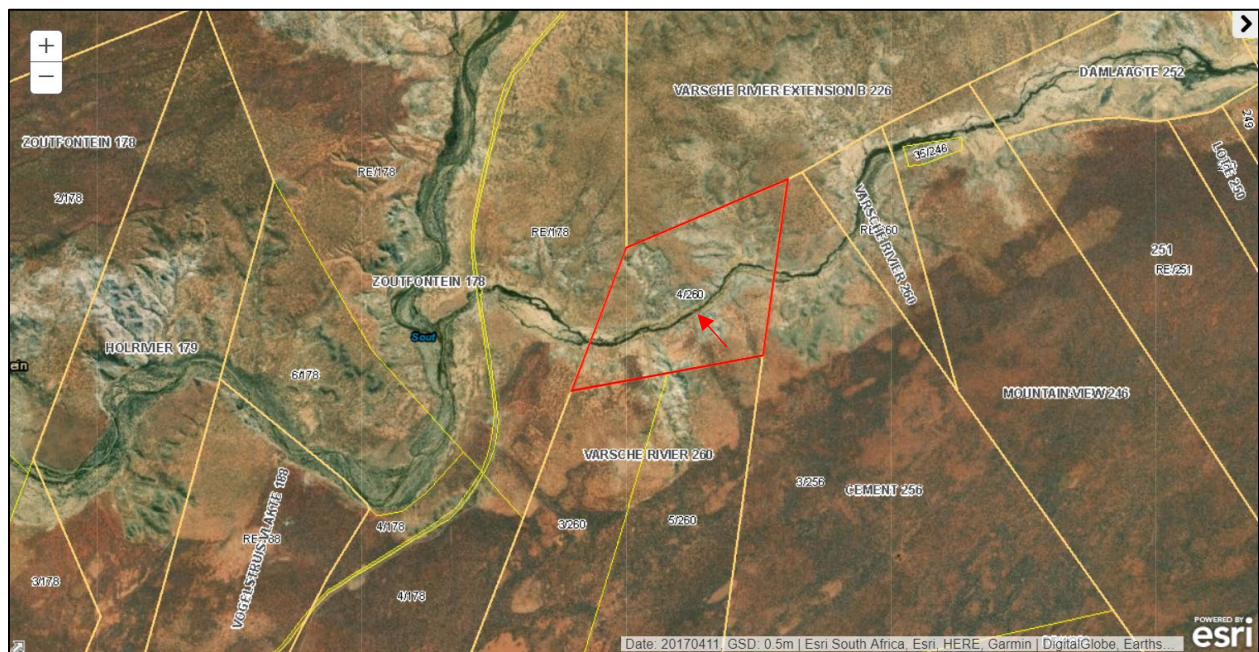
<https://sahris.sahra.org.za/objects/vr003-faunal-material-batch-caseid8015>

D. Location Details

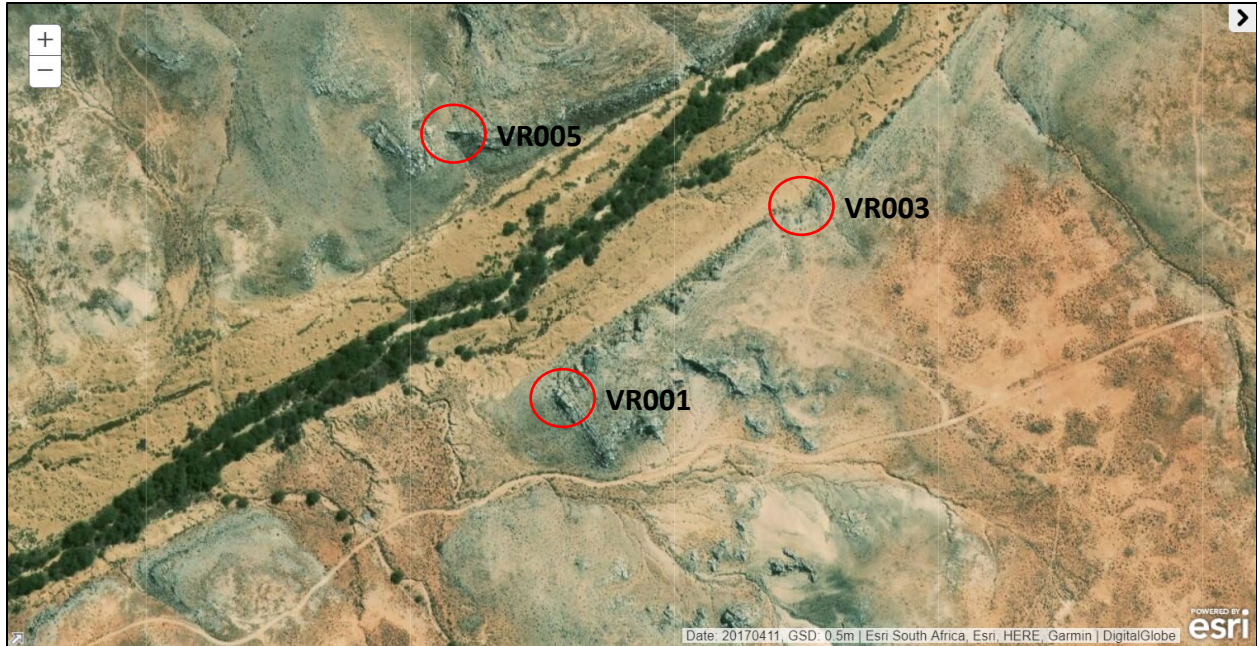
Location name(s): Site Varsche Rivier 003, located on Portion 4 of Varsche Rivier 260.

GPS coordinates: 31° 31' 29.8272" S, 18° 36' 10.8468" E

Mapping: 1:50 000 mapsheet is 3318 DA Vanrhynsdorp



Aerial view of the region showing the location of Farm 260/4. The area enlarged below is shown by the red arrow.



Aerial view of the study area showing VR003 and two other nearby sites.

Nearest town: Vredendal and Vanrhynsdorp

Local Municipality: Matzikamma

Magisterial District: Vanrhynsdorp

Province: Western Cape

Formation/Subgroup/Group (for palaeontological specimens): N/A

Approximate age of materials: 90-80 000 years

E. List of all Participating Researchers

Teresa E. Steele, University of California, Davis

Alex Mackay, University of Wollongong

F. Curation of Materials

Name of the institution: Iziko: South African Museum

Name of the curator: Dr. Wendy Black

Contact details of the curator: Direct Line: +27 (0) 21 481 3883; Email: wblack@iziko.org.za

Institutional address: 25 Queen Victoria Street, Gardens, Cape Town, SOUTH AFRICA

Due to refurbishments at Iziko, and to facilitate analysis, these collections are temporarily housed in the Department of Archaeology, University of Cape Town. The person responsible for curation there is Ms Louisa Hutten (louisa.hutten@uct.ac.za; +21 650 3820; 082 575 3210)

Institution/facility where the material was sent to and corresponding details as outlined above (for export permits):

Zooarchaeological Laboratory (Young 204)
 Department of Anthropology
 University of California, Davis
 One Shields Ave.
 Davis, CA 95616-8522 USA

Lithics Lab (41.G22)
 Centre for Archaeological Science
 School of Earth, Atmospheric and Life Sciences
 University of Wollongong
 Northfields Avenue
 Wollongong, NSW, 2522 AUSTRALIA

How is the material being curated (number of boxes/bags, type of bags, accession list etc.)?

20 boxes, provided by SAM, so of their standard size and quality:

1 of 20	Special Stone Artefacts (Backed, Points, Pigment, Misc.); Teeth; Special/ID'd Bone; OES study collection
2 of 20	Dating; TL sample stone artefacts; TL sediment samples; misc. sed samples; problems (orphans, etc)
3 of 20	Piece Plotted Stone Artefacts - all layers
4 of 20	Piece Plotted Stone Artefacts - all layers; "big stuff" (large cobbles, hammerstones, cores, etc)
5 of 20	Stone Artefacts - layers 01, 02, cleanings, & mixed
6 of 20	Stone Artefacts - layers 03 & 04
7 of 20	Stone Artefacts - layers 04 & 05
8 of 20	Stone Artefacts - layer 05
9 of 20	Stone Artefacts - layer 06
10 of 20	Stone Artefacts - layer 07
11 of 20	Stone Artefacts - layers 07 & s1
12 of 20	Stone Artefacts - layers III-xx
13 of 20	Bone - layers 01, 02, 03, 04, cleanings & mixed
14 of 20	Bone - layers 05 & 06
15 of 20	Bone - layers 07 & s1
16 of 20	Bone - layers III-xx
17 of 20	OES - layers 01, 02, 03, III-xx, cleanings & mixed
18 of 20	OES - layer 04
19 of 20	OES - layers 05, 06, 07 & s1
20 of 20	Charcoal/Plant/Landsnail - all layers

J. Temporary Export

Letter attached from Ms Louisa Hutten (Chief Scientific Officer, Department of Archaeology, UCT), temporary curation facility, confirming return of objects.