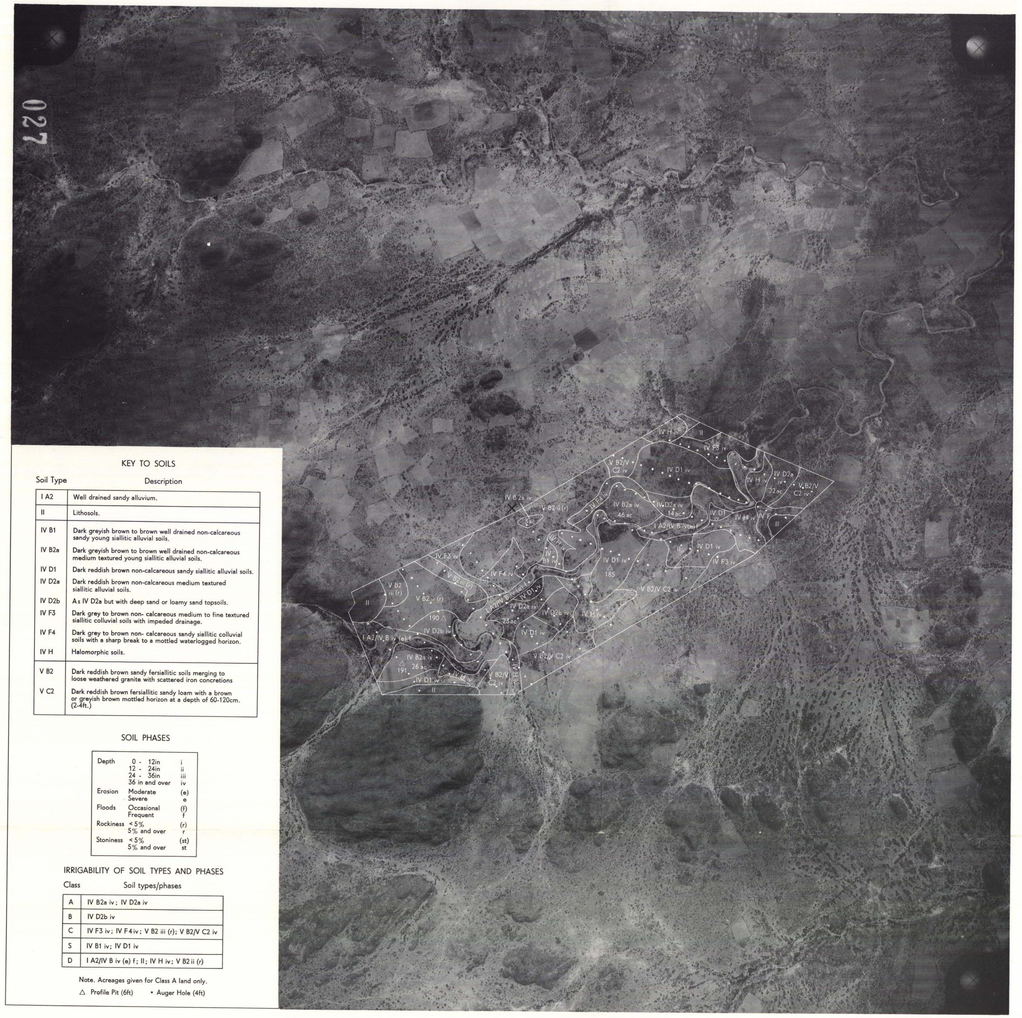
8700 AJ Wageningen
The Netherlands

country : Botswana
subject : Khanyi
scale : 1:20,000
map ref. : Bo6 D11
libr. ref. : AF6-24

BOTSWANA SEMI DETAILED SOIL SURVEY

SHEET D:- LOTLAKANE
BOBONONG

LOTLAKANE



KEY TO SOILS

Soil Type	Description
I A2	Well drained sandy alluvium.
II	Lithosols.
IV B1	Dark greyish brown to brown well drained non-calcareous sandy young siallitic alluvial soils.
IV B2a	Dark greyish brown to brown well drained non-calcareous medium textured young siallitic alluvial soils.
IV D1	Dark reddish brown non-calcareous sandy siallitic alluvial soils.
IV D2a	Dark reddish brown non-calcareous medium textured siallitic alluvial soils.
IV D2b	As IV D2a but with deep sand or loamy sand topsoils.
IV F3	Dark grey to brown non- calcareous medium to fine textured siallitic colluvial soils with impeded drainage.
IV F4	Dark grey to brown non- calcareous sandy siallitic colluvial soils with a sharp break to a mottled waterlogged horizon.
IV H	Halomorphic soils.
V B2	Dark reddish brown sandy fersiallitic soils merging to loose weathered granite with scattered iron concretions
V C2	Dark reddish brown fersiallitic sandy loam with a brown or greyish brown mottled horizon at a depth of 60-120cm. (2-4ft.)

SOIL PHASES

Depth	0 - 12in	i
	12 - 24in	ii
	24 - 36in	iii
	36 in and over	iv
Erosion	Moderate	(e)
	Severe	e
Floods	Occasional	(f)
	Frequent	f
Rockiness	< 5%	(r)
	5% and over	r
Stoniness	< 5%	(st)
	5% and over	st

IRRIGABILITY OF SOIL TYPES AND PHASES

Class	Soil types/phases
A	IV B2a iv; IV D2a iv
B	IV D2b iv
C	IV F3 iv; IV F4 iv; V B2 iii (r); V B2/V C2 iv
S	IV B1 iv; IV D1 iv
D	I A2/IV B iv (e) f; II; IV H iv; V B2 ii (r)

Note. Acreages given for Class A land only.
△ Profile Pit (6ft) • Auger Hole (4ft)

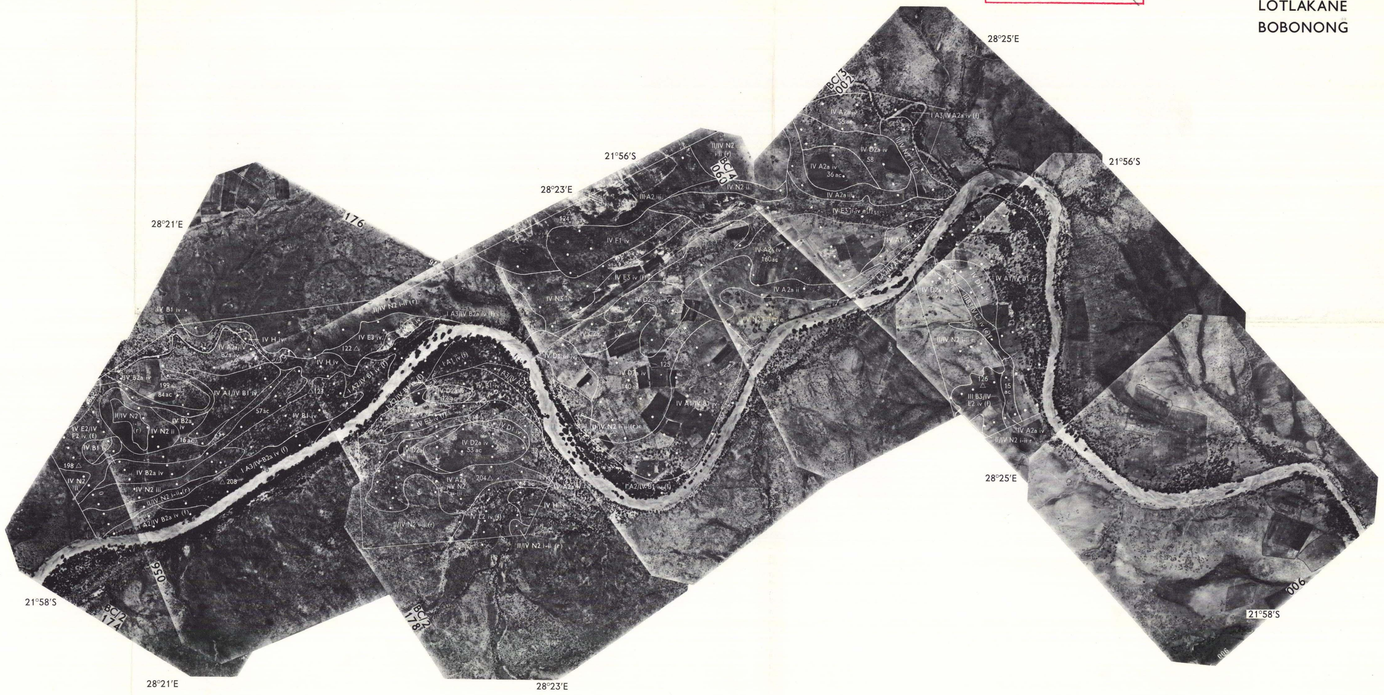
1/20,000 Approximate Scale

Mile 1 3/4 1/2 1/4 0 1 Mile

D.O.S. 3157 D
Geographical values approximate

© Government of Botswana 1973.

BOBONONG



1/20,000 Approximate Scale

Mile 1 3/4 1/2 1/4 0 1 2 3 Miles

KEY TO SOILS

Soil Type	Description
I A1	Excessively permeable gravelly alluvium.
I A2	Well drained sandy alluvium.
I A3	Well drained medium textured alluvium.
II	Lithosols.
III A2	Very dark brown lithomorphic vertisols.
III B3	Very dark brown topomorphic vertisols with a granular surface mulch.
IV A1	Dark greyish brown to brown well drained calcareous sandy young siallitic alluvial soils.
IV A2a	Dark greyish brown to brown well drained calcareous medium textured young siallitic alluvial soils.
IV B1	Dark greyish brown to brown well drained non-calcareous sandy young siallitic alluvial soils.
IV B2a	Dark greyish brown to brown well drained non-calcareous medium textured young siallitic alluvial soils.
IV C2a	Dark reddish brown calcareous medium textured siallitic soils
IV D1	Dark reddish brown non-calcareous sandy siallitic alluvial soils.
IV D2a	Dark reddish brown non-calcareous medium textured siallitic alluvial soils.
IV D2b	As IV D2a but with deep sand or loamy sand topsoils.
IV E2	Dark brown to grey compact calcareous medium to fine textured siallitic soils with restricted permeability and impeded drainage.
IV E3	Dark brown to grey calcareous medium to fine textured siallitic colluvial soils with impeded drainage.
IV F1	Dark reddish brown compact non-calcareous medium to fine textured siallitic soils with restricted permeability and impeded drainage.
IV H	Halomorphic soils.
IV L2	Very dark brown to black strongly calcareous fine textured siallitic colluvial soils.
IV N2	Very dark brown to greyish brown calcareous medium textured siallitic upland soils.
IV N3	Very dark brown to greyish brown calcareous fine textured siallitic upland soils.

SOIL PHASES

Depth	0 - 12in	i
	12 - 24in	ii
	24 - 36in	iii
	36 in and over	iv
Erosion	Moderate	(e)
	Severe	e
Floods	Occasional	(f)
	Frequent	f
Rockiness	< 5%	(r)
	5% and over	r
Stoniness	< 5%	(st)
	5% and over	st

IRRIGABILITY OF SOIL TYPES AND PHASES

Class	Soil types/phases
A	IV A2a iv; IV A2a/IV B2a iv; IV B2a iv; IV D2a iv
B	I A3/IV A2a iv (f); I A3/IV B2a iv (f); III A2 iii; IV A2a iii; IV A2a/IV N2 ii-iii; IV C2a iii; IV D2a iv e, ii-iii; IV D2b iii-iv; IV L2 iv (f); IV N2 iii
C	IV A2a ii; IV E2/IVF2 iv (f); IV E3 iv, iv (f); IV F1 iv; IV N2 ii; IVN3 ii
S	I A2/IV B1 iv (f); I A2/IV B2 iv (f); IV A1 iv; IV A1/IV B1 iv; IV B1 iv; IV D1 ii-iv, iii-iv, iv
D	I A1 iv (f); II/IV N2 i-ii r, i-ii (r), i-ii (r) e; IV D1 ii-iv; IV E3 ii-iv e (f); IV H iv

Note. Acreages given for Class A land only.
△ Profile Pit (6ft) • Auger Hole (4ft)

Prepared by Directorate of Overseas Surveys 1968.
Printed for D.O.S. by the Ordnance Survey.

Field investigation and related aerial photographic interpretation by A.J.B. Mitchell, Land Resources Division 1966.
To accompany Land Resource Study No. 7, "The Irrigation Potential of Soils along the Main Rivers of Eastern Botswana – A Reconnaissance Assessment", by A.J.B. Mitchell; published by Land Resources Division, Overseas Development Administration, Tolworth Tower, Surbiton, Surrey, England, KT6 7DY.

RP87/0012 2