

Annex C3.1.1 Criterion of Land Evaluation for Dryland Arable Farming

NO	DESCRIPTION	SYMBOL	LAND EVALUATION CLASSES			
			S1	S2	S3	N
1	Soil Depth	s	> 75 cm	> 50 cm	> 25 cm	> 10 cm
2	Texture of Root Zones	s	clay, fine loam, fine silt	clay, fine loam, fine silt	clay, coarse and fine loam, coarse and fine silty	clay, coarse and fine loam, coarse and fine silt, stony
3	Available of Water/Porosity	s	high	high to moderate	high to low	high to low
4	Soil Fertility	n	very high to medium	very high to low	very high to very low	very high to very low
5	Soil Acidity	a	pH 5.0 - 7.0	pH 4.5 - 8.0	pH 4.0 - 8.0	pH < 4.0, liming required
6	Salinity DHL x 1000	x	< 1.5	< 2.5	< 4.0	> 4.0 soil reclamation required
7	Soil Drainage	d	moderate to well	moderate to well	moderately to well	very poorly to well
8	Flooding	f	onces in 10 years	< 3 times in 10 years	< 4 times in 10 years with often medium damage	often serious flooding, and water management required
9	Erosion Susceptibility	e	none to little	medium	heavy	very heavy
10	Slopes/Micro Relief	t	< 3 % with few micro relief	< 3 % with medium micro relief	< 8 % with many micro relief	> 8 %, with complex slopes
11	Climatic Type (oldeman)	r	A1, A2	A, B1, B2, B3	A, B, C, D1, D2	A, B, C, D, E1, E2

Source Data : RePPorT, 1981

S1: highly suitable

S3: marginally suitable

S2: moderately suitable

N: not suitable

Annex C3.2.1 Criterion of Land Evaluation for Wetland Rice

NO	DESCRIPTION	SYMBOL	LAND EVALUATION CLASSES			
			S1	S2	S3	N
1	Soil Depth	s	> 75 cm	> 50 cm	> 25 cm	> 10 cm
2	Texture of Top Soil (0-30cm)	s	clay, fine loam, fine silt	clay, fine loam, fine silt	clay, coarse and fine loam, coarse and fine silt	clay, coarse and fine loam, coarse and fine silt, stony
3	Permeability of Top Soil (0-30 cm)	s	< 0.5 cm/hour	< 2.0 cm/hour	< 6.5 cm/hour	< 25 cm/hour
4	Stone and Gravel Limitation Factor		none	none to few	none to few gravel and stony	none to few gravel and stony
5	Soil Fertility	n	high to medium	very high to low	very high to very low	very high to very low
6	Soil Acidity	a	pH 5.0 - 7.5	pH 4.5 - 8.0	pH 4.0 - 8.0	pH 3.5 - 8.5
7	Salinity	x	< 1.5	< 2.5	< 2.5	< 4.0
8	Slope	t	<1 %	< 3 %	< 5 %	>= 5 %
9	Elevation (a.s.l.)	t	< 750 m	< 750 m	< 750 m	< 750 m
10	Micro Relief	t	80 % areal flat	80 % area flat	> 50% area flat	> 40 % area flat
11	Limitation Factor of Water Less	m	none	sometimes limited	moderately limited, four times in 10 less of water	moderately to strong limited, 6 times in 10 years water less
12	Soil Drainage	d	moderate to poor	moderate to poor	moderate to very poor	very poor to well
13	Flooding	f	onces in 10 years	three times in 10 years	four times in 10 years with moderate damage	more than 4 times in 10 years with heavy damage
14	Anosol Peat Decomposition	k	sapric	sapric	saprik	hemic and or fibric
15	Peat Depth	g	< 50 cm	< 50 cm	< 100 cm	< 150 cm
16	Mineral Soil Dertility	n	very high to medium	very high to low	very high to very low	very high to very low
17	Poxicity (depth of cat clay)	c	> 150 cm	> 100 cm	> 100 cm	> 50 cm
18	Salinity DHL x 1000	x	< 1.5	< 2.5	< 2.5	< 4.0

Source Data : RePPPorT, 1981

S1: highly suitable

S3: marginally suitable

S2: moderately suitable

N: not suitable

Annex C3.3.1 Criterion of Land Evaluation for Major Tree Crops

NO	DESCRIPTION	SYMBOL	LAND EVALUATION CLASSES			
			S1	S2	S3	N
1	Soil Depth	s	> 100 cm	> 75 cm	> 50 cm	Others
2	Textures	s	clay, fine loam, fine silt	clay, fine loamy, fine silt	clay, coarse and fine loam, coarse and fine silty	clay, coarse and fine loam, coarse and fine silt, stony
3	Availability of Water	s	high	high to medium	high to low	high to low
4	Soil Fertility	n	very high to medium	very high to low	very high to very low	very high to very low
5	Soil Acidity	a	pH 5.0 - 7.0	pH 4.5 - 8.0	pH 4.0 - 8.0	pH < 4.0 - > 8.0
6	Salinity DHL x 1000	x	< 1.5 mmhos/cm	< 2.5	< 4.0	Others
7	Soil Drainage	d	moderate to well	moderate to poorly	moderate to well	very poor to well need drainage improvement
8	Flooding	f	< 3 times in 10 years	< 4 times in 10 years	often but not serious	often with serious damage
9	Erosion	e	none to few	medium to heavy	heavy to very heavy	heavy to very heavy
10	Slope	t	< 8%	< 8 %	< 15 %	> 25 %
11	Climatic Types	r	A, B	A, B, C1, C2, C3	A, B, C, D1, D2, D3	A, B, C, D, E1, E2
12	Organosol Peat Decomposition	k	sapric	sapric	sapric	hemic
13	Peat Depth	g	< 50 cm	< 50 cm	< 100 cm	Others
14	Mineral Soil Fertility	n	very high to medium	very high to low	very high to very low	very high to very low
15	Toxicity (depth of cat clay)	c	> 150 cm	> 100 cm	> 50 cm	Others
16	Salinity DHL x 1000	x	< 1.5 mmhos/cm	< 2.5 mmhos/cm	< 4.0	Others

Source Data : RePPPorT, 1981

S1: highly suitable
S3: marginally suitable

S2: moderately suitable
N: not suitable

Annex C3.5.1 Summary of Land Suitability by Land System

LAND SYSTEM	WETLAND RICE	DRYLAND ARABLE	RUBBER	OIL PALM	COCONUT	COFFEE	COCOA	CLOVE	PEPPER	SUGAR CANE	PINEAPPLE	CASHEW	BANANA
KHY (1)	S3	S3	S3	S3	S2	N	N	N	N	S2	N	S3	S3
SBG	S3	S3	S3	S3	S2	N	N	N	N	N	N	N	N
BKN	S3	S3	S3	S3	N	N	N	N	N	N	N	N	N
SLK	S1	S2	S3	S3	S2	N	N	N	N	S2	N	S2	S2
TNJ	S2	S2	S2	S2	S2	N	N	N	N	N	N	N	N
KNJ	S2	S2	S2	N	S2	S1	N	S2	S2	S2	S2	S2	S2
MBI	S3 (2)	S3 (3)	S2	S2	S2	S3	S2	S2	S2	S3	S2	S2	S3
TLU	N	S3	S2	N	S3	S1	S2	S2	N	S2	S2	N	S2
SMN	S3	S3	S2	S2	S2	S3	S3	S2	S2	S2	S2	S2	S2
PKS	N	S3	S2	S2	S2	S3	S3	S2	S2	S3	S2	S2	S3
SMI	N	S3	S2	S2	S2	S3	S3	S2	S2	S2	S2	S2	S2
SMD	N	S3	S2	S2	S2	S3	S3	S2	S2	S2	S2	S2	S2
BGI	N	N	S3	N	S3	S3	S3	S	S	S	N	S	S
GJO	N	N	S3	S3	S3	S3	S3	S	N	S	N	S	S
SAR	N	N	S	S	S	S	S	S	S	S	N	S	S
BTK	N	N	S3	S3	S3	S3	S3	S	S	S3	N	S	S
BTG	N	N	S	S	S	S	S	N	N	N	N	N	S
SKA	N	N	S3	S3	S3	S3	S3	N	S	S3	N	S	S
GSM	N	N	S	S	S	S	S	S	S	S	N	S	S

Note:

(1) Large Area of this land system may be unsuitable : more detailed investigations required

(2) Estimated : 15 % of total area of land system

(3) Estimated : 25 % of total area of land system

Source Data : RePPPorT, 1981

S: Suitable for tree crop under estate management only

S1: highly suitable

S2: moderately suitable

S3: marginally suitable

N: not suitable