

**Table 1b: Small and Medium-Scale Household Income and Other Characteristics By Quintile of Household Per-Capita Land Use – 2004**

Draft Set of Household Categorisation Tables – Jan 10, 2009 ACF/FSRP  
Tadeyo Lungu, Augustine Mutelekesha, Antony Chapoto, Margaret Beaver and Michael Weber

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
Household total Income						
Total hh income (ZMK hh)	2,018,894	2,158,058	2,309,488	2,344,229	3,684,486	2,473,153 ZMK
HH per capita income (ZMK hh/pc)	305,639	306,409	356,995	442,104	956,783	460,983 ZMK
HH income composition						
% income from crops	61.41	72.33	76.09	76.21	79.08	72.82 %
% income from livestock	3.64	4.54	3.68	3.92	4.35	4.02 %
Off farm income (%)	33.41	22.57	19.82	19.01	15.95	22.36 %
% from salary and wages	16.99	8.61	7.49	7.29	5.23	9.25 %
% from formal/informal business	13.84	12.15	10.39	10.21	8.79	11.15 %
% from remittances	2.58	1.82	1.93	1.52	2.29	2.03 %
% households reporting off farm income	56.76	51.18	49.68	52.74	47.06	51.59 %
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases)	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004

**Table 2b: Demographic Characteristics of Small and Medium-Scale Households By Quintile of Household Per-Capita Land Use - 2004**

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
Number of hh family Members	7.06	6.59	5.95	5.26	4.01	5.83 mem
Number of adults in the hh age 12 and above (number-weighted)	4.14	4.00	3.69	3.41	2.81	3.63 mem
Number of prime age adults in hh ages 15 to 59	3.54	3.41	3.16	3.00	2.53	3.16 mem
Number of adult equivalents in HH	3.99	3.77	3.41	2.98	2.27	3.32 mem
Number of hhs with elderly members	24.27	26.28	27.14	30.12	32.38	27.90 mem
Number of elderly people in hh (60 years and above)	.30	.31	.34	.37	.40	.34 mem
Female headed hh (%)	26.20	22.57	19.91	24.32	24.41	23.45 %
% single female headed hh	22.78	18.29	16.78	20.45	20.42	19.72 %
% married female headed hh	3.43	4.28	3.12	3.88	3.74	3.69 %
HHs with orphans(%)	19.29	14.52	13.21	13.54	9.76	14.19 %
% hhs with single orphans	16.86	11.93	10.51	10.87	6.96	11.56 %
% hhs with double orphans	4.58	4.13	3.41	3.06	3.64	3.78 %
Number of orphans in the HH	.29	.19	.18	.16	.12	.19 mem
Age of head of household	46.73	46.25	47.05	48.38	49.84	47.58 yrs
Level of education of head in years	6.00	6.12	6.04	5.93	5.48	5.93 yrs
Years of education of the most highly educated male	6.17	6.24	6.22	5.95	5.51	6.03 yrs
Years of education of the most highly educated female	.00	.00	.00	.00	.00	.00
% of hhs with chronically ill adults	16.69	16.58	16.25	15.50	15.21	16.07 %
% of hhs with death of male prime-age adult	4.26	5.44	3.83	6.13	3.57	4.66 %
% of hhs with death of female prime-age adult	6.00	5.55	4.33	5.65	5.64	5.43 %
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases )	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004

**Table 3b: Land Characteristics of Small and Medium-Scale Households By Quintile of Household Per-Capita Land Use - 2004**

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
% of hhs cultivating crops	99.54	100.00	100.00	100.00	100.00	99.90 %
Area cultivated among cropping hhs ha/hh	.60	1.10	1.48	1.98	2.95	1.58 ha/hh
% of hhs with fallow fields	13.36	28.96	37.53	43.14	49.09	33.92 %
Average area under fallow among those with fallow ha/hh	.36	.48	.71	1.00	2.36	1.14 ha/hh
Landholding size hh level (cultivated + fallow fields. ha)	.64	1.24	1.75	2.42	4.11	1.97 ha/hh
% hh using HH labour only	52.93	60.91	54.38	48.10	44.57	52.42 %
% hh using hired labour	8.17	9.04	13.03	16.55	17.97	12.78 %
% hh using draught animals (own, hired or borrowed)	20.04	22.93	26.01	29.76	32.66	26.07 %
% hh using hired/borrowed animals for ripping/ploughing	13.25	12.72	13.95	14.25	13.33	13.50 %
% hh using mechanical (own, hired or borrowed)	3.40	1.32	2.29	1.72	2.05	2.16 %
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases)	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004

**Table 4b: Cropping Characteristics of Small and Medium-Scale Households By Quintile of Household Per-Capita Land Use - 2004**

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
% of hhs growing no crops	3.40	1.08	1.55	1.64	1.47	1.84 %
% of hhs growing 1 crop only	42.48	19.12	14.51	11.65	9.92	19.89 %
% of hhs growing 2 crops	34.25	33.99	28.48	26.22	27.71	30.24 %
% of hhs growing 3 crops	12.37	27.88	29.70	26.62	26.27	24.49 %
% of hhs growing maize	70.46	79.16	85.10	84.55	85.79	80.84 %
Area planted of maize by maize growing hhs (ha/hh)	.42	.62	.76	1.00	1.48	.86 ha/hh
% of hhs growing cotton	3.28	8.58	13.55	11.04	16.76	10.47 %
Area planted of cotton by cotton growing hhs	.38	.53	.69	.99	1.48	.93 (ha/hh)
% of hhs growing maize and cotton	3.20	8.48	13.47	10.98	16.69	10.39 %
Area planted of maize & cotton by growing hhs (ha/hh)	.80	1.20	1.50	2.17	3.08	2.00 (ha/hh)
% of hhs growing just cassava	12.27	5.90	3.68	3.50	2.98	5.76 %
Area planted of cassava by cassava growing hhs (ha/hh)	.37	.55	.67	.89	1.18	.73 (ha/hh)
% of hhs growing ground nuts	24.19	41.05	45.38	51.74	53.26	42.75 %
Area planted of ground nuts by growing hhs (ha/hh)	.17	.26	.30	.35	.49	.33 (ha/hh)
% households with access to extension	38.37	44.76	49.95	50.70	53.78	47.30 %
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases)	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004

**Table 5b: Asset Ownership of Small and Medium-Scale Households By Quintile of Household Per-Capita Land Use - 2004**

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
% hh owning agric. implements	12.16	13.94	19.59	20.15	25.52	18.05 %
% hh owning small livestock	66.20	76.37	77.29	77.51	76.83	74.75 %
% hh owning large livestock	12.44	15.67	19.44	21.42	25.90	18.76 %
% hh owning draught power	6.84	8.36	11.08	13.23	16.75	11.08 %
Number of cattle owned	13.71	9.73	8.20	8.11	11.67	10.07 %
Number of goats owned	5.84	5.51	6.12	6.15	7.79	6.34 %
% Ownership of bicycles	39.42	47.42	51.87	52.21	52.60	48.56 %
Value of productive assets (ZMK/hh )	1,106,277	1,065,760	1,129,807	1,265,704	2,138,772	1,320,334 ZMK
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases )	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004

**Table 6b: Fertiliser Use of Small and Medium-Scale Households By Quintile of Household Per-Capita Land Use - 2004**

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
Total household income (ZMK)	2,018,894	2,158,058	2,309,488	2,344,229	3,684,486	2,473,153
% of hhs using fertiliser	24.69	22.57	31.44	32.24	37.25	29.40 %
% of hhs using fertiliser on maize	23.22	21.71	29.35	31.23	35.51	27.97 %
Amount used by maize farmers using fertiliser (kgs/ha)	117.87	75.36	94.04	84.29	98.26	93.35 mt/ha
Total fertiliser used per ha cropped all hhs (kgs/ha)	71.89	37.41	51.29	37.32	45.42	48.37 mt/ha
Total quantity of fertiliser used (mts)	9,087	9,506	17,593	18,272	31,948	86,405 mts
% hhs growing maize & using fertiliser that sell maize	30.81	40.66	54.65	55.07	63.09	50.33 %
Sales of maize by fertiliser users (mt/hh)	.60	.58	1.06	1.23	3.12	1.58 mt/hh
Maize yield on area planted when using fertiliser mt/ha	2.12	1.96	1.97	1.91	1.94	1.97 mt/ha
% maize grow hhs using fert who obtained FSP fert %	6.20	6.90	8.00	12.66	14.96	9.46 %
Total quantity of FSP fertiliser used mts	2,183	3,396	4,406	7,610	11,361	28,956 mts
HH income of those hhs obtaining FSP fertiliser ZMK	5,047,713	3,603,616	3,456,044	4,168,733	8,784,468	5,338,201 ZMK
Value of hh assets for hhs obtaining FSP fertiliser ZMK	677,942	2,198,132	2,457,933	2,489,773	5,052,959	2,886,006 ZMK
Maize yield among hhs using FSP fertiliser mt/ha	2.08	2.22	2.02	1.92	2.02	2.04 mt/ha
% maize grow hhs using fer, purchasing it in open mkt	14.12	12.01	20.15	18.62	23.50	17.42 %
Total quantity of market purchased fertiliser used mts	5,344	5,129	11,239	10,315	18,719	50,746 mts
HH income of those hhs purchasing fertiliser ZMK	4,271,062	3,783,394	5,225,883	4,298,976	6,287,259	4,895,923 ZMK
Value of hh assets for hhs purchasing fertiliser ( ZMK )	820,433	839,658	1,557,594	2,043,183	3,893,356	1,964,370 ZMK
Maize yield for hhs purchasing market fertiliser mt/ha	2.30	2.03	2.03	2.04	2.07	2.09 mt/ha
% maize growing hhs using fert. obtaining PAM fert. %	1.97	3.48	4.28	3.85	2.98	3.30 %
Total quantity of PAM acquired fertiliser used mts	398	782	1,177	913	1,037	4,307 mts
HH income of those hhs obtaining PAM fertiliser ZMK	1,659,435	1,833,333	2,534,758	3,112,637	3,288,094	2,507,170 ZMK
Value of hh assets for hhs obtaining PAM fert. ZMK	147,028	1,345,682	1,384,036	483,157	3,401,157	1,277,880 ZMK
Maize yield among hhs using PAM fertiliser mt/ha	1.94	1.96	2.08	1.77	1.69	1.91 mt/ha
% of hhs growing maize not using fertiliser	76.96	78.34	70.65	68.89	64.49	72.10 %
HH income of hhs not using fert.from any source ZMK	1,439,814	1,830,704	1,467,284	1,613,217	1,888,825	1,639,065 ZMK
Value of hh assests for hhs not using fertiliser ( ZMK )	1,205,241	1,007,614	927,403	955,432	1,037,594	1,030,192 ZMK
Maize yield on area planted NOT using fert. (mt/ha)	1.47	1.29	1.34	1.21	1.22	1.31 mt/ha
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases)	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004

**Table 7b: Location of Small and Medium-Scale Households By Quintile of Household Per-Capita Land Use - 2004**

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
% hhs in AEC Zone 1	25.16	19.88	18.38	21.24	19.51	20.87 %
% hhs in AEC Zone 2a	19.09	24.78	30.30	26.46	30.68	26.13 %
% hhs in AEC Zone 2b	12.71	14.68	12.37	13.56	11.93	13.08 %
% hhs in AEC Zone 3	43.03	40.66	38.95	38.74	37.88	39.92 %
% hhs in Northern	16.48	18.01	17.49	20.21	19.25	18.24 %
% hhs in Luapula	13.10	11.66	10.01	10.75	10.07	11.15 %
% hhs in Northwestern	9.61	9.85	9.71	7.16	4.28	8.24 %
% hhs in Copperbelt	5.89	5.05	5.40	4.79	6.78	5.56 %
% hhs in Central	10.45	10.09	10.87	10.94	14.24	11.24 %
% hhs in Eastern	12.46	20.84	22.79	20.30	22.33	19.66 %
% hhs in Lusaka	4.40	1.95	2.69	2.80	2.01	2.79 %
% hhs in Southern	15.34	11.49	9.53	12.75	11.42	12.12 %
% hhs in Western	12.26	11.05	11.52	10.29	9.62	10.99 %
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases )	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004

**Table 8b: Market Behaviour and Access of Small and Medium-Scale Households By Quintile of Household Per-Capita Land Use - 2004**

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
Total national maize production mts	129,440	183,879	277,731	303,176	470,877	1,365,103 mts
% of hhs selling maize	13.50	20.91	32.44	36.86	40.31	28.40 %
Amount of maize sold by selling hhs kgs/hh	421	411	702	896	2,068	1,029 mt/hh
Total national maize sales mts	14,982	22,575	59,681	82,684	190,411	370,332 mts
% of total smallholder maize production	9.48	13.47	20.35	22.21	34.49	100 %
% of total smallholder maize sales	4.05	6.10	16.12	22.33	51.42	100 %
% hhs using fertiliser that sell maize	30.81	40.66	54.65	55.07	63.09	50.33 %
Total national maize sales by fertiliser users mts	11,241	13,480	44,629	52,580	159,763	281,692 mts
% of total maize sales by fertiliser users	3.04	3.64	12.05	14.20	43.14	76.06 %
% of FSP fertiliser users selling maize	34.59	45.08	51.80	57.45	67.34	53.95 %
Sales of maize by FSP fertiliser users mt/hh	.22	.41	.69	.71	2.36	1.03 mt/hh
Total national maize sales by FSP users mts	2,922	6,260	10,970	17,425	60,196	97,773 mts
% of total maize sales by FSP fertiliser users	.79	1.69	2.96	4.71	16.25	26.40 %
% of commercial fertiliser users selling maize	33.36	41.91	56.71	57.49	65.44	52.67 %
Sales of maize by market fertiliser users mt/hh	.23	.28	.65	.91	2.32	.97 mt/hh
Total national maize sales by mkt fertiliser users	7,586	7,772	29,698	35,164	102,057	182,277 mts
% of total maize sales by mkt fertiliser users	2.05	2.10	8.02	9.50	27.56	49.22 %
% of non-fertiliser using hhs selling maize	47.40	57.88	50.56	53.53	44.42	50.56 %
Sales of maize by non-fertiliser users mt/hh	.22	.29	.35	.61	.75	.49 mt/hh
Total national maize sales by non-fert users mts	3,741	9,095	15,052	30,104	30,647	88,640 mts
% of total maize sales by non-fertiliser users	1.01	2.46	4.06	8.13	8.28	23.94 %
% of hhs selling cotton	3.28	8.36	13.25	10.96	16.46	10.29 %
Amount of cotton (kgs) sold by selling hhs	558	500	826	929	1,289	909 kgs/hh
% of hhs selling groundnuts	7.82	17.07	22.22	25.58	29.51	20.14 %
Amount of groundnuts (kgs) sold by selling hhs	64	73	94	96	121	96 kg/hh
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases)	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004

**Table 9b: Food Security Indicator (Market Behaviour By Mutually Exclusive Net Buyer and Net Seller Position) and Market Access of Small and Medium-Scale Households By Quintile of Household Per-Capita Land Use - 2004**

Selected Characteristics of Smallholders	Means for Household Category Ranked by Quintiles of Household Per Capita Land Use (Cultivated + Fallow Fields)					Overall National Average (0 – 20 ha)
	1 Low	2	3 Mid	4	5 High	
Landholding Size Household Per Capita (ha/hh/pc)	.09	.19	.29	.46	1.11	.41 ha/hh/pc
Percent of all Smallholder Households (%)	20.79	20.74	20.68	19.76	18.02	100 %
% of hhs who only sell maize	7.75	14.59	22.28	26.62	32.11	20.29 %
% of hhs who buy maize/meal (but do produce)	34.61	28.64	23.10	20.17	16.66	24.90 %
% of hhs who buy maize/meal (but don't produce)	15.49	10.54	7.95	7.87	5.48	9.60 %
% of hhs not in the maize market as buyers nor sellers	36.40	39.91	36.52	35.10	37.56	37.10 %
% of hhs who both buy & sell maize (net sellers)	2.92	3.04	5.27	7.44	5.46	4.78 %
% of hhs who both buy & sell maize (net buyers)	2.83	3.27	4.88	2.59	2.74	3.28 %
% of hhs who buy & sell maize (net = zero)				.21		.04 %
Total No. households (unweighted cases)	1,084	1,083	1,084	1,084	1,084	5,419
Total No. households (weighted cases )	263,430	262,862	262,038	250,437	228,378	1,267,145

Source: CSO/MACO/FSRP Supplemental Survey 2004