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The current state of surgical training in East, Central and Southern Africa

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The current state of surgical training in East, Central and Southern Africa

Stephen W.O. Ogendo Secretary General

COMESA region



Surgical Services

- Physician Surgeons
 - General
 - Subspecialties
- Non Physician Surgeons
 - General
 - Anaesthesia
 - Surgical
 - Others

Medical schools (UG + PG) in region

	NUMBER OF MEDICAL SCHOOLS AND OUTPUT						
COUNTRY	PUBLIC	PRIVATE	TOTAL	OUTPUT			
ETHIOPIA	2	7	9	?			
KENYA	5	1	6	NBI 350 Eld 100			
MALAWI	1	-	1	60			
MOZAMBIQUE	2	1	3	150			
RWANDA	1	-	1	100			
TANZANIA	2	4	6	3			
UGANDA	3	2	5	220			
ZAMBIA	1	-	1	100			
ZIMBABWE	2	_	2	200			

Surgical training programmes in the region

COUNTRY	G/S	ORTH	PLAST	UROL	NEUR	CARDI	ENT	PAED	MAXF	ОРТН
ETHIOPIA	\checkmark	√	\checkmark	\checkmark	√	√	√			√
KENYA	\checkmark	\checkmark	\checkmark	√	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark
TANZANIA	\checkmark	\checkmark			\checkmark					
MALAWI	\checkmark	√								\checkmark
UGANDA	\checkmark	\checkmark	\checkmark							
RWANDA	\checkmark									
ZAMBIA	\checkmark	\checkmark		\checkmark						
MOZAMBIQUE	\checkmark	\checkmark	√ *	\checkmark	√ *	√ *	\checkmark	√ *	\checkmark	\checkmark

Summary of surgeons in the region

COUNTRY			TRAIN	NED SURG	GEONS (CI	JRRENTLY	/ REGISTI	ERED)		
	G SURG	ORTH	PLAST	UROL	NEURO	CARDIO	ENT	PAED	MAX F	TOTAL
ETHIOPIA							9			230
KENYA			8	20	12	10	48	9	16	400
MALAWI	10	7	1	-	1	1	1	1	-	22
MOZAMBIQUE	15	4	1	2	2	1	4	2	2	33
RWANDA										28
TANZANIA						2				100
UGANDA	120	28					25			173
ZAMBIA	34?	10	?	3	2		1			58
ZIMBABWE			2	8	3	1	1	?2		55
										1104

Population

COUNTRY	Population
MOZAMBIQUE	20,000,000
ETHIOPIA	53,000,000
KENYA	39,000,000
TANZANIA	42,700,000
MALAWI	13,600,000
UGANDA	32,400,00
RWANDA	10.473,000
ZAMBIA	13,046,000
ZIMBABWE	11,400,000
TOTAL	293,319,000

Surgeon per population = 1:266,000

Rwanda

Programme	Training Insitution	Award	Duration	Entry Requirements
GENERAL SURGERY	UNIVERSITY	MMED	4 YRS	MD

Programme	Running? Y/	Average	Total	Total	Govt funded
started	N. State No.	Intake /	trained	Training	training
	in training	Max intake		Cost	available
		per year			
2006	YES	8	1	6,500 US \$	YES

Tanzania

Program me	Training Institutio n.	Award	Duration	Entry Require ments
General Surgery	University	MMED	4yr	MD
Orthopa edics	University	MMED	4yr	MD
Urology	University	MSC	3yr	M. MED
Neurosur gery	University	MSC	3yr	M. MED

Tanzania

	Running? Y/ N. No. in training	Average Intake / Max intake per year	Total trained	Total Training Cost Inc tuition, exams etc	Govt funded training available
Gens Surg	Υ	8		\$7400	Yes
Ortho	Υ	4		\$7400	Yes
Urology	Υ	2	6		Yes
Neurosur	Υ	2			Yes
g					

Uganda

Program me	Training Institutio n.	Award	Duration	Entry Requirem ents	When Prog started
Gen Surgery	Makerere Mbarara Univ	MMED	3years	MBChB	1967
Orthopae dic ENT	Makerere Univ Makerere Univ		4years 3years	MBChB	1998
Ophthal mology	Makerere Univ	MMED	2years	MBChB	

Uganda

	Running? Y/ N. State No. in training	Intake /	Total trained	Total Training Cost Inc tuition, exams etc	Govt funded training available
Gen surg	Υ	10	?100	10	Υ
Ortho	Y - 30	6	60	\$1000	Υ
ENT	Υ	?	?	?	Υ
Opthalm ology	Υ	?	?	?	У

Zambia

Program me	Training Institutio n.	Award	Duration	Entry Require ments	When Prog started
Gen Surgery	University	MMED	4yrs	MBBS	1986
Orthopa edic	University	MMED	4yrs	MBBS	1996
UROLOG Y	University	MMED	4yrs	MBBS	2006

Zambia

	Running? Y/ N. State No. in training	Average Intake / Max intake per year	Total trained	Total Training Cost Inc tuition, exams etc	Govt funded training availabl e
General surg	Y - 18	6	35	ZK14m/yr locals \$12000/yr foreigner	Y
Ortho	Y - 4	2	6	Ditto	Υ
urology	Y - 3	2	-	Ditto	Υ

Zimbabwe

Program me	Training Institution.	Award	Duration	Entry Requirem ents	When Program me started
Gen Surgery	University	MMED	4yrs	MBBS	1986
Neurosur gery	University	MMED	4yrs	MBBS	
UROLOGY	University	MMED	4yrs	MBBS	2000

Zimbabwe

	Running? Y/ N. State No. in training	Average Intake / Max intake per year	Total trained	Total Training Cost Inc tuition, exams etc	Govt funded training available
G/S	Y - 8	6	36	\$1800/yr (locals) \$5000/yr foreigners	Υ
Neuro	Y - 1	Erratic		Ditto	Υ
Urology	Y - 3	1	4	Ditto	Υ

Kenya

Program	Training	Award	Duration	Entry	When
me	Institutio			Requirem	Prog
	n.			ents	started
Gen	Universit	MMED	5yrs	MBChB	1970
Surgery	y x3				2005
					2010
Neurosur	Universit	MMED	5yrs	MBChB	2009
gery	y x 1				
ENT	Universit	MMED	5yrs	MBChB	1986
	y x1				
Orthopae	Universit	MMED	5yrs	MBChB	2008
dic	y x 2				
Ophthal	Universit	MMED	3yrs	MBChB	
mology	y x1				

Kenya

	Running? Y/ N. State No. in training	Average Intake / Max intake per year	Total trained	Total Training Cost Inc tuition, exams etc	Govt funded training available
G/S	Y – 30 Y – 3 Y - 5	12	Approx. 300+	USD 3700 to Free	Υ
Neuro	Y - 5	2 - 3	nil	USD 3700	Υ
ENT	Y – 2 to 3			USD 3700	
Ortho	Y - 5		NIL	USD 3700	
Onthal				LICD 2700	

Non physician training

- Present in all countries within the region
- Given wider role in some countries
 - Malawi
 - Tanzania
 - Zambia
 - Mozambique

Malawi

Programme	Cadre	Training Institution.	Award	Duration	Entry Requirements
Clinical Medicine	Gen Clinical Officer	College of Health Sciences.	Diploma in Clinical Medicine	3yrs	'O' Level
Anaesthesia	Anaes Clinical Officer	School of Anaesthesia	Diploma	18 months	Diploma in clinical medicine or Nursing plus 4yrs work
Orthopaedics	Ortho Clinical Officer	School of Orthopaedic Clinical Officers	Diploma	18 months	Diploma in clinical medicine plus 4yrs work
Opthalmology	Opth Clinical Officer	School of Opthalmology	Diploma	18 months	Diploma in clinical medicine plus 4yrs work

Malawi

	Started	Intak e	Total traine d	Cost / year	Internshi p period		Govt funding available
Clinical med	1975	50	750	?	1yr	yes	Yes
Anesth esia	1985	30	100	?	no	yes	Yes
ortho	1985	20	140	?	no	yes	Yes
Opthal mology	1985	?	?	?	no	yes	Yes

Zambia

Programme	Cadre	Training Institution.	Award	Durati on	Entry Requireme nts	When Prog starte d
General	Clinical Officer	Chainama College	Diplom a	3yrs	High school	?
	Medical Licentiate	Chainama College	Post basic Diplom a	2yrs	Clinical Officer	?
Opthalmolo gy	Clinical officer	Chainama College	?	?	?	?
anaesthesia	Clinical officer	Chainama College	?	?	?	?

Zambia

	Inta ke	Total trained	Cost / year	Internship period	MOH Approved	Govt funded training
General	?	+2656	?	?	yes	Yes
	?	+92	?	1yr	yes	Yes
Opthal	.	3	?	?	yes	Yes
Anaesth esia	?	5	?	?	yes	Yes

Mozambique

Programme	Cadre	Training Institution.	Award	Durati on	Entry Requiremen ts	When Prog starte d
Surgery	Technicos Surgery	Govt	Diploma	5yrs	High school or nurses / Ass MO plus 3 yr clinical exp	1984
anaesthesia	Technicos anaesthesia	Govt	Diploma	?yrs	?	?
opthalmology	Technicos opthalmology	Govt	Diploma	?yrs	?	?

Mozambique

	Intake	Total trained	Cost	Internship period	MOH Approved	Govt funded training available
Surgery	.	100	\$2000/y r	1yr	yes	Yes
Anaesth esia	?	90	?	1yr	yes	Yes
Opthal	?	20	?	1yr	yes	Yes

Uganda

Programme	Cadre Eg Clinical Officer	Training Institution.	Award	Durati on	Entry Requireme nts
Surgery	Clinical officers	Government	Diploma	? 3 yrs	A level
Orthopaedic	Orthopedic officers	Government	Diploma	? 3 yrs	A level
Anaesthesia	Anaesthetic officer	Government	Diploma	? 3 yrs	A level

Uganda

When Prog started	Intak e	Total traine d	Cost / year	Internshi p period	MOH Approve d	Registere d with Medical Council	Govt funded training availabl e
??	??	? ?	??	No	Yes	No	Yes
??	. 55	. .5.5	??	No	Yes	No	Yes
??	. 55	. .5.5	??	No	Yes	No	Yes

Non physician training

- Slight difference in training periods between countries.
- Slight difference in emphasis/specialties
 between countries
- All have government support
- Options for further personal development

Misc surgical services

COUNTRY	YES	NO	Type of Camp
ETHIOPIA	\checkmark		Surgical: AMREF
KENYA	\checkmark		Surgical: SSK
MALAWI	\checkmark		Ophthalmology
MOZAMBIQUE		\checkmark	
RWANDA		\checkmark	
TANZANIA	√		Surgical, ortho, neuro: AMREF,
			MOI
UGANDA	\checkmark		Surgical, ortho: ASOU, UOA
ZAMBIA	\checkmark		Ortho, plastic, urol: FLYSPEC
ZIMBABWE		\checkmark	

Access to surgical services

COUNTRY	Free access to emergency surgery	National Insurance available	Public ambulance service available	Private ambulanc e service available
ETHIOPIA	YES	YES	NO	YES
KENYA	yes	yes	YES (not for call to homes)	yes
MALAWI	YES	NO	NO	YES
MOZAMBIQUE	YES	NO	NO	YES
RWANDA	YES	YES	YES	NO
TANZANIA	YES	YES	NO	YES
UGANDA	YES	NO	NO	NO
ZAMBIA	YES	NO	NO	YES
ZIMBABWE	YES	YES	YES	YES