

Supplementary Table 1a.: Prevalence of severe acute (SAM) and protein energy malnutrition (PEM) by states across Nigeria

Region	State	Year of data collection	SAM/PEM	Reference
North West	Kaduna	NA	36.0	Tanimu et al, 2021 (16)
North Central	FCT-Abuja	NA	2.9	Oyinwola et al., 2022 (14)
South East	Enugu	NA	1.9	Ekechukwu et al, 2022 (17)
South West	Osun	2017	46.0	KAB O, 2022 (15)

Supplementary Table 1b.: Prevalence of Stunting, Wasting, and Underweight by states across Nigeria

Region	State	Year of data collection	Stunting (%)	Wasting (%)	Underweight (%)	Reference
North East	-	2016-2017	52.4	13.0	40.0	Moeteke et al, 2019 (37)
	Sokoto	2017	31.0	-	24.0	Manyong et al, 2021(58)
	Kebbi	2017	33.9	-	22.8	Manyong et al,2021(58)
	Kaduna	2019	42.9	-	22.2	Resnick et al, 2021 (68)
	Kano	2016-2017	58.5	12.9	42.6	Moeteke et al 2019 (37)
		2017	48.6	22.8	41.9	Maje et al, 2019 (35)
		2019	46.0	-	26.9	Resnick et al, 2021 (68)
	Kaduna and Jigawa	NA	61.3	6.3	8.8	Kehinde et al 2020 (22)
	Kaduna (North & South)	NA	58.6	-	-	Tanimu et al 2021 (16)
North Central	Benue	2017	31.7	-	12.5	Manyong et al 2021(58)
		NA	44.4	-	-	Seer-Uke et al, 2021(56)
	Bida, Niger	NA	23.5	27.8	27.4	GO et al, 2022 (31)
		2016-2017	34.9	7.1	19.6	Moeteke et al 2019 (37)
	Kwara	2014	55.8	-	-	Fadare et al, 2019 (23)
	FCT, Abuja	NA	41.0	29.3	42.0	Idowu et al, 2020 (30)

South East	-	2016-2017	16.9	8.2	13.7	Moeteke et al, 2019 (37)
	Ebonyi	2017	28.5		12.5	Manyong et al, 2021 (58)
	Enugu	2018	9.5	5.3	8.3	Ajah et al,2021 (41)
		NA	23.4	6.7	15.6	Amadi et al, 2018 (49)
		NA	-	-	39.8	Ekechukwu et al, 2022 (17)
	NA	-	25	28.8		Ezeofor et al, 2020 (52)
South West	-	2016-2017	19.4	8.9	16.6	Moeteke et al 2019 (37)
	Ondo	2017	18.6	25.3	29.5	Oludu et al 2019 (32)
	Ifedore, Ondo	NA	23.0	1.0	20.0	Adewole et al 2022 (36)
	Ondo	2019	16.7	13.8	21.7	Akande et al 2019 (53)
	Ibadan, Oyo	NA	27.4	1.8	-	Yahaya et al (10)
	Ogun	2017	28.6	-	16.4	Okike et al 2021,(93)
		2017	32.5	-	17.7	Manyong et al 2021(58)
	Ibadan (North), Oyo	NA	30.7	-	-	Adepoju et al, 2018 (44)
	Ido, Oyo	NA	40.6	-	-	Adepoju et al, 2018 (44)
	Osun	NA	12.9	24.0	5.9	Abolurin et al, 2018 (24)
		NA	7.2	9.2	8.4	Abolurin et al, 2020 (24)
		2016	28	-	-	Afolami et al,2021(65)
	Lagos	NA	28	8.3	14.3	Senbanjo et al, 2019 (39)
South South	-	2016-2017	19	6.8	13.8	Moeteke et al, 2019 (37)
	Akwa Ibom	NA	37.4	13.1	18.2	Alamu et al, 2020 (33)
	Edo	2018	-	0.1	-	Ajakaye et al 2020 (63)

Supplementary Table 2: Prevalence of Severe and Moderate Undernutrition by States across Nigeria

Region	State	Year of study	Stunting (%)		Wasting (%)		Underweight (%)		Reference
			Severe	Moderate	Severe	Moderate	Severe	Moderate	
North West	Kaduna		54.5	28.8	66.7	13.6			Abdullahi et al, 2021 (26)
	Kaduna	NA	44.8	13.8	31.4	16.3	36.1	25.3	Tanimu et al, 2021(16)
	Kebbi	2017	28.1	15.8			8.4	14.4	Manyong et al, 2021 (58)
	Sokoto	2017	15	15.8			6.3	17.7	Manyong et al 2021 (58)
North Central	Benue	2017	18.6	13.1			4.1	8.4	Manyong et al, 2021 (58)
	Bida, Niger State	NA	5.7	17.8	6.5	21.3	10.4	17.0	GO et al, 2022 (31)
	FCT	NA	12.9		5.7		8.8		Idowu et al, 2020 (30)
	FCT Abuja	NA		44.7	37.2	29.2	46.0	37.8	Idowu et al, 2020 [37]
South East	Ebonyi	2017	13.9	14.6			4.6	8.9	Manyong et al, 2021(58)
	Anambra state	NA		8.2		8.2			Onuekwe et al ,2018 (29)
South South	Rivers	NA	39.1	8.7	27.6	8	13.5	24.2	Nkeiruka et al, 2018 (33,47)
	Rivers	NA	3.4	10.2	1.5	7.3	3.4	7.1	Okari et al, 2019(25)
	Akwa Ibom	NA	17.6	19.8	6.9	6.2	6.9	11.3	Alamu et al, 2020 (33)
South West	Ogun	2017	13.6				16.4		Okike et al, 2021(93)
	Ogun	2017	13.6	15.0			5.3	11.1	Manyong et al, 2021 (58)
	Ibadan, Oyo state	NA	11.9	15.5	2.4	6.4		3.5	Yahaya et al, 2021 (10)

Supplementary Table 3: Prevalence of Stunting, Wasting, and Underweight in Urban and Rural areas in Nigeria

State	Year of data collection	Stunting (%)		Wasting (%)		Underweight (%)		Reference
		Urban	Rural	Urban	Rural	Urban	Rural	
NATIONAL PREVALENCE								
Nigeria	2013	27.2	72.8	35.6	64.4	31.2	68.8	Agu et al, 2022 (46)
	2016-2017	30.6	49.3	10.5	10.9	23.0	35.3	Moeteke et al, 2019 (37)
	2018	28.1	71.9	30.1	69.9	27.1	72.9	Tesfaw et al, 2021 (19)
	2002-2020	26.8	44.8	-	-	-	-	Ekholuenetale et al, 2022 (21)
STATE-WIDE PREVALENCE								
State	Year	Stunting (%)		Wasting (%)		Underweight (%)		Reference
		Urban	Rural	Urban	Rural	Urban	Rural	
Ibadan, Oyo	NA	30.7	40.6					Adepoju et al, 2018 (44)
Ibadan, Oyo	NA	27.4		1.8				Yahaya et al 2021 (10)
Lagos	NA	12.6	64.7	8.7	9.3	9.3	26	Senbanjo et al, 2019 (39)
Benue	NA	38.2	49.5	7.9	7.4	7.9	5.3	Seer-Uke et al, 2021 (56)

Supplementary Table 4: Prevalence of Stunting, Wasting, and Underweight According to Gender

Region	State	Year of data collection	Stunting (%)		Wasting (%)		Underweight (%)		Reference
			Male	Female	Male	Female	Male	Female	
NATIONAL PREVALENCE									
Nigeria		2013	53.1	46.9	52.3	47.7	53.5	46.5	Agu et al, 2019 (46)
		2017	26.9	23.1	17.5	17.5	20.5	23	Ogunnaike et al, 2018 (51)
		2018	54.1	45.9	59.1	40.9	53.3	46.7	Tesfaw et al, 2021 (19)
		2002-2020	39.4	34.2	-	-			Ekholuentale et al, 2022 (45)
STATE-WIDE PREVALENCE									
Region	State	Year	Stunting (%)		Wasting (%)		Underweight (%)		Reference
			Male	Female	Male	Female	Male	Female	
North West	Kaduna & Jigawa	NA	75.8	51.1	3	8.5	6.1	10.6	Kehinde et al, 2022 (22)
	Kaduna	NA	73.2	45.7	42.5	60.9	61.5	61.4	Tanimu et al, 2021 (16)
	Kaduna	NA	55.3	44.7	50.0	50.0	55.9	44.1	Danimoh et al, 2020(48)
North Central	FCT, Abuja	2017	44.7	37.2	29.2	29.5	46.0	37.8	Idowu et al, 2020 (30)
South East	Enugu	NA	19.4	21.4	12.9	10.1	18.4	17.2	Amadi et al, 2018 (49)
South West	Ondo	2013	27.1	25.8	7.8	8.2	14.9	14.4	Osunmakinwa et al, 2022 (50)
	Ondo	2018	20.2	16	2.5	4.0	15.1	7.0	Osunmakinwa et al, 2022 (50)
	Ondo	2019	14.4	18.7	13	14.4	27.5	17.1	Akande et al, 2019 (53)
South South	Rivers	NA					10.5	9.2	Grace et al, 2019 (40)
	Rivers	NA	13.4	14	9.2	8.3	9.2	11.9	Okari et al, 2019 (25)
	Edo	2016-2017					21.8	7.9	Atimati et al 2019 (54)
	Edo	2017	34.1	30.7			18.3	16.9	Manyong et al, 2021 (58)

Supplementary Table 5: Prevalence of Overweight and Obesity in Nigeria

Region	State	Year of data collection	Overweight %	Obesity %	Reference
North West	Sokoto	2017	5.6	5.3	Manyong et al, 2021 (58)
	Kebbi	2017	17.2	16.5	
North Central	Bida, Niger		2.6	0.9	Oladele et al, 2022(31)
	Benue	NA	12.1	25.9	Seer-Uke et al. 2021 (56)
	Benue	2017	7.8	5.8	Manyong et al, 2021(58)
	Abuja FCT	NA		0.6	Idowu et al., 2020 (36)
South East	Enugu	2018	9.0	2.8	Ajah et al, 2021(41)
	Ebonyi	2017	5.7	3.9	Manyong et al, 2021 (58)
	Oyo		14.4	20.2	Bamisaye et al., 2018
	Ibadan, Oyo		17.2	22.3	Bamisaye et al., 2018
	Ido, Oyo		5.0	13.9	Bamisaye et al., 2018
	Lagos	2013	16.6		Adeniyi et al, 2018 (57)
	Ogun	2017	11.1	9	Okike et al, 2019 (93)
		2017	11.1	8.6	Manyong et al, 2021(58)
	Ondo	2019	10.2	15.2	Akande et al, 2019 (53)
South South	Rivers	NA	1.5		Okari et al, 2019 (25)