

# म्रीजाल्ट्याञ्चेद्रान्यज्ञान्। नृपणाञ्चेदायञ्चीयाःगविदा



# NATIONAL STATISTICS BUREAU Royal Government of Bhutan



MONTHLY CONSUMER PRICE INDEX (CPI) BULLETIN MARCH 2015

NATIONAL ACCOUNTS & PRICE DIVISION NATIONAL STATISTICS BUREAU

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#### **FOREWARD**

National Statistics Bureau (NSB) is pleased to release the Consumer Price Index (CPI) Bulletin for March 2015. This is the 16<sup>th</sup> series of monthly CPI Bulletin published by National Accounts and Price Division, NSB.

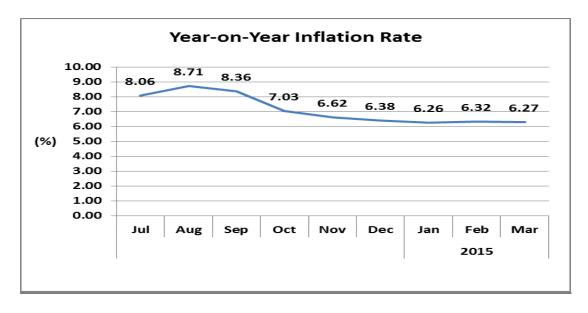
The Bulletin is compiled using December 2012 as the price reference period and tracks the price movements of 436 commodities and services in 20 districts and 2 major urban areas. The rebased CPI uses the Geometric Modified Laspeyres formula, and has separate indices for domestic and imported goods and services.

We thank all agencies and stakeholders for their support in bringing out this bulletin and look forward for their continued support.

April 2015

National Statistics Bureau

**GRAPH 1: YEAR-ON-YEAR INFLATION** 



## YEAR-ON-YEAR INFLATION RATE

The annual inflation rate for March 2015 [i.e., from March 2014 to March 2015] rose by 6.27%. This was 0.05 percentage point lower than the previous month which was 6.32%. Price of food has risen by 4.77% and non-food by 7.28%. Within the food group, milk, cheese and egg recorded an increase of 9.14% followed by meat prices which rose by 8.14%. Among the non-food, the prices of vehicle recorded the highest increase with about 37% followed by house rent with 12.76%.

Prices of local produced goods & services increased by 6.28% while imported goods increased by 6.35% over one year period [i.e. from March 2014 to March 2015].

					Table	e 1: Yea	ır on Ye	ear Inde	ex & pe	rcent c	hange	(Natio	nal)									
							Index	Decemb	er 2012=	=100)								perc	ent char	nge(%)		
Croup	Walaha		20	13					2014					2015			20	14			2015	
Group	Weights	Sep	0ct	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar
Food	39.92	110.78	113.48	114.40	115.49	115.34	115.60	115.60	120.90	120.98	121.39	121.42	121.04	121.11	121.12	9.14	6.62	6.12	5.13	4.94	4.77	4.77
Non-Food	60.08	108.40	109.06	109.30	109.44	110.29	110.45	110.75	116.90	117.04	116.91	117.36	118.17	118.59	118.81	7.84	7.31	6.96	7.23	7.15	7.37	7.28
Overall	100	109.34	110.80	111.31	111.82	112.28	112.48	112.66	118.48	118.60	118.68	118.96	119.31	119.59	119.73	8.36	7.03	6.62	6.38	6.26	6.32	6.27

Table 2: Year-on-Year Index & percentage change (Domestic )  Index (December 2012=100) Percent change(%)																						
***************************************							Index	Decemb	er 2012=	:100)								Pero	ent char	ige(%)		
C	Maishe.		20	13					2014					2015			20:	14			2015	
Group	Weights	Sep	0ct	Nov	Dec	Jan	Feb	Mar	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar
Food	17.15	111.34	115.58	116.92	118.54	117.87	117.13	117.44	121.17	121.31	121.82	122.07	121.89	122.15	122.06	8.82	4.96	4.19	2.98	3.41	4.29	3.93
Non-Food	30.24	106.70	107.92	107.97	107.97	108.64	109.31	110.22	116.58	116.92	116.93	117.59	117.84	118.58	118.64	9.25	8.34	8.30	8.91	8.46	8.48	7.64
Total	47.39	108.36	110.63	111.12	111.68	111.89	112.08	112.78	118.22	118.49	118.68	119.19	119.29	119.86	119.87	9.10	7.10	6.80	6.72	6.61	6.95	6.28
Total   47.39   108.36   110.63   111.12   111.68   111.89   112.08   112.78   118.22   118.49   118.68   119.19   119.29   119.86   119.87   9.10   7.10   6.80   6.72   6.61   6.95   6.50   6.72   6.61   6.95   6.50   6.72   6.61   6.95   6.50   6.72   6.61   6.95   6.50   6.72   6.61   6.95   6.50   6.72   6.61   6.95   6.50   6.72   6.95   6.72   6.95   6.72   6.95   6.72   6.95   6.72   6.95   6.72   6.95   6.72   6.95   6.72   6.95   6.72   6.95   6.72   6.95   6.72   6.95   6.72																						
							Index	(Decemb	er 2012=	100)								Pero	ent char	ige(%)		
			20	13					2014					2015			20:	14	•		2015	
Group	Weights	Sep	0ct	Nov	Dec	Jan	Feb	Mar	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar
Food	22.77	110.34	111.92	112.56	113.30	113.55	114.54	114.35	120.97	121.03	121.39	121.27	120.75	120.67	120.76	9.64	8.14	7.85	7.04	6.35	5.34	5.60
Non-Food	29.84	110.14	110.23	110.68	110.96	111.98	111.61	111.28	117.22	117.16	116.89	117.12	118.51	118.60	118.98	6.43	6.29	5.61	5.55	5.83	6.26	6.92
Total	52.61	110.23	110.96	111.49	111.96	112.66	112.87	112.60	118.83	118.82	118.82	118.90	119.48	119.49	119.75	7.81	7.08	6.57	6.19	6.05	5.86	6.35

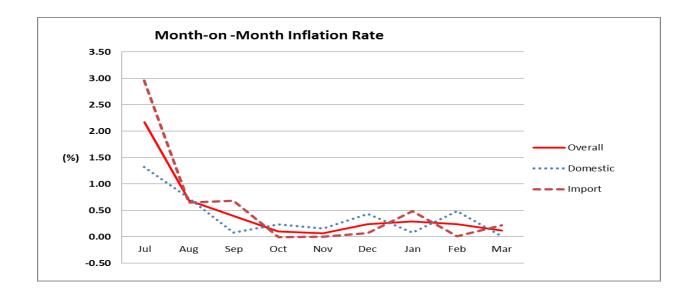
						Tab	le 4: Ye	ar on Y	ear ind	lex: Gro	oup Lev	rel										
							Index	(Decemb	er 2012=	100)									% Chang	e		
12 Major Groups			20	13					2014					2015			20	14			2015	
12 Major Groups	Weights	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar	Sep	Oct	Nov	Dec	Jan	Feb	Mar
FOOD AND NON-ALCOHOLIC BEVERAGES	36.89	109.29	112.14	113.09	114.25	114.02	114.22	114.21	119.96	120.02	120.47	120.48	120.02	120.05	119.98	9.76	7.02	6.53	5.45	5.26	5.10	5.06
ALCOHOLIC BEVERAGES AND NARCOTICS	3.03	130.60	131.05	131.61	131.76	132.68	133.67	134.02	133.59	134.24	134.24	134.64	135.49	135.97	137.06	2.28	2.44	2.01	2.19	2.12	1.72	2.27
CLOTHING AND FOOTWEAR	9.20	114.94	115.57	116.52	117.01	118.79	117.69	117.82	118.49	118.66	119.06	119.98	120.77	121.56	121.65	3.09	2.67	2.18	2.54	1.67	3.28	3.24
HOUSING, WATER, ELECTRICITY, GAS AND OTHER FUELS	21.70	107.79	109.53	109.58	109.58	109.74	110.14	111.38	120.93	121.49	121.18	122.08	122.22	122.80	122.80	12.19	10.92	10.59	11.40	11.38	11.50	10.25
FURNISHING, HOUSEHOLD EQUIPMENT AND ROUTINE MAINTENANCE OF THE HOUSE	2.20	118.82	119.31	120.10	120.61	122.52	123.37	123.54	124.46	124.53	124.70	125.69	126.98	127.20	127.41	4.75	4.37	3.83	4.21	3.64	3.11	3.14
HEALTH	4.68	104.58	104.58	105.17	105.17	106.98	104.64	103.66	105.16	105.28	105.28	105.28	107.06	107.39	107.83	0.55	0.66	0.10	0.10	0.08	2.63	4.02
TRANSPORT	11.98	104.63	104.44	104.46	104.57	106.26	106.54	106.36	119.45	118.96	118.49	118.09	119.70	119.07	119.69	14.16	13.91	13.43	12.93	12.65	11.76	12.54
COMMUNICATION	3.03	100.22	99.58	99.58	99.58	99.77	99.76	99.73	95.44	95.47	95.47	95.47	95.47	95.47	95.47	-4.77	-4.12	-4.12	-4.12	-4.31	-4.30	-4.27
RECREATIONAL AND CULTURE	2.35	108.66	108.37	108.37	108.34	108.86	110.48	109.63	109.68	109.69	109.72	109.81	110.41	110.44	110.73	0.94	1.22	1.24	1.36	1.43	-0.04	1.01
EDUCATION	1.64	109.63	109.63	109.63	109.63	109.63	114.96	114.96	116.03	116.03	116.03	116.03	116.03	122.40	122.40	5.84	5.84	5.84	5.84	5.84	6.48	6.48
RESTAURANTS AND HOTELS	1.24	115.24	115.24	115.24	115.24	113.03	112.92	113.00	114.60	114.60	114.73	115.63	118.58	118.62	120.00	-0.56	-0.56	-0.44	0.34	4.91	5.05	6.19
MISCELLANEOUS GOODS AND SERVICES	2.06	114.36	114.88	115.10	115.97	115.57	117.84	117.11	119.11	119.22	119.22	119.74	121.01	121.52	121.51	4.15	3.78	3.58	3.25	4.71	3.12	3.75
All	100.00	109.34	110.80	111.31	111.82	112.28	112.48	112.66	118.48	118.60	118.68	118.96	119.31	119.59	119.73	8.36	7.03	6.62	6.38	6.26	6.32	6.27

					Table	5: Year	-on-yea	ar Inde	x & Per	cent Ch	ange:	Food G	roup									
							Index	(Decemb	er 2012=	:100)								Perc	ent char	ige(%)		
			20	13					2014					2015			20	14			2015	
Group	Weights	Sep	0dt	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar
Bread and Cereals	9.75	114.43	114.56	115.31	115.90	116.91	117.07	117.25	120.74	120.83	121.53	121.74	121.17	121.36	121.85	5.52	5.47	5.39	5.04	3.64	3.66	3.92
Meat	3.10	115.38	115.38	115.47	115.59	116.70	117.07	118.93	128.78	128.45	128.00	128.58	128.93	128.49	128.62	11.61	11.33	10.85	11.24	10.48	9.76	8.14
Fish	1.06	116.75	116.81	117.44	117.44	125.39	125.77	125.27	131.48	132.66	129.41	129.98	129.91	130.73	130.91	12.62	13.57	10.19	10.67	3.60	3.94	4.50
Milk, cheese and eggs	6.88	107.76	108.58	109.26	110.87	112.47	112.94	113.04	120.20	120.51	123.10	123.95	124.27	124.38	123.37	11.54	10.99	12.66	11.80	10.49	10.14	9.14
Oils and fats	3.19	107.92	110.08	110.07	110.24	110.27	110.59	111.69	112.10	112.10	112.82	113.17	113.57	113.50	113.51	3.88	1.84	2.49	2.66	3.00	2.63	1.63
Fruit	1.68	101.16	107.13	108.58	113.89	115.97	116.15	116.75	116.62	115.06	114.09	113.28	112.30	112.45	112.81	15.28	7.41	5.08	-0.53	-3.17	-3.19	-3.38
Vegetables	7.82	102.95	112.60	114.75	116.50	110.78	110.49	109.63	120.13	120.13	119.58	118.10	116.16	115.96	115.83	16.69	6.69	4.21	1.38	4.86	4.95	5.66
Sugar, jam, honey etc	0.98	108.65	109.07	109.10	109.10	110.23	109.82	106.31	109.70	109.70	109.84	109.88	109.78	109.68	109.66	0.96	0.58	0.68	0.72	-0.41	-0.12	3.15
Food products n.e.c	0.64	114.75	115.20	119.50	122.69	120.56	121.55	120.11	124.27	125.27	125.36	126.41	125.34	125.39	125.68	8.29	8.74	4.91	3.03	3.96	3.16	4.64
Coffee, tea and cocoa	0.68	111.50	114.51	114.59	115.29	116.68	118.34	117.50	119.24	119.53	119.18	119.66	121.18	120.96	120.99	6.94	4.38	4.01	3.79	3.85	2.21	2.97
Mineral water, softdrinks & juices	1.11	105.81	105.95	105.95	105.95	105.93	106.55	106.12	106.49	106.62	106.62	107.26	107.71	107.96	106.91	0.64	0.63	0.63	1.23	1.68	1.33	0.75
Splrits	0.65	107.63	107.63	108.17	108.51	109.11	109.38	109.71	111.59	112.55	112.55	112.96	114.79	115.12	115.12	3.68	4.57	4.05	4.10	5.21	5.24	4.93
Wine	0.44	116.81	116.81	117.39	117.77	118.41	118.71	119.06	121.11	121.11	121.11	121.50	121.50	121.50	121.50	3.68	3.68	3.17	3.17	2.61	2.35	2.04
Beer	0.56	109.81	111.84	113.34	113.34	113.56	113.78	112.18	111.64	111.85	111.85	111.85	112.24	112.33	112.33	1.67	0.01	-1.31	-1.31	-1.16	-1.27	0.13
Narcotics	1.38	159.06	159.06	159.06	159.06	160.70	162.89	164.38	161.34	162.32	162.32	162.91	163.72	164.73	167.64	1.44	2.05	2.05	2.42	1.88	1.13	1.98

				Ta	able 6:	Year-or	n-Year I	ndex &	Percei	nt Chan	nge: No	n-Food	d Grou	)								
							Index	(Decemb	er 2012=	100)								Pero	ent Char	ige(%)		
Group	Weights		20	13					2014					2015			20:	14			2015	
Group	weights	Sep	0ct	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar	Sep	0ct	Nov	Dec	Jan	Feb	Mar
Clothing	6.24	115.19	115.90	116.65	117.16	118.22	117.50	117.76	117.42	117.45	118.03	119.14	119.79	120.88	120.99	1.93	1.33	1.19	1.69	1.33	2.88	2.75
Footw ear	2.96	114.41	114.88	116.23	116.69	119.99	118.10	117.97	120.79	121.25	121.26	121.75	122.88	123.00	123.03	5.58	5.55	4.32	4.34	2.40	4.15	4.29
Housing (rental)	15.12	107.48	107.48	107.48	107.48	107.58	108.10	110.04	121.26	121.97	121.97	123.24	123.24	124.08	124.08	12.83	13.49	13.49	14.67	14.56	14.79	12.76
Maintenancen & repair of the dwelling	1.88	110.75	112.09	112.73	112.80	112.17	112.56	110.98	111.35	112.07	111.93	112.20	113.71	113.71	113.69	0.54	-0.02	-0.70	-0.53	1.38	1.02	2.44
Electricity, gas & other fuels	4.54	107.57	115.53	115.53	115.53	116.19	116.19	116.19	124.42	124.42	122.96	122.96	122.96	122.96	122.96	15.67	7.70	6.44	6.44	5.83	5.83	5.83
Furniture and furnishing, carpets and other floor	0.37	105.38	105.38	106.24	106.24	115.07	114.73	114.48	119.84	119.84	119.84	119.84	119.98	119.98	119.98	13.72	13.72	12.80	12.80	4.27	4.58	4.81
Household textiles	0.57	140.15	140.15	142.12	143.86	143.99	144.01	144.45	146.58	146.65	147.58	149.17	150.76	151.22	151.79	4.59	4.64	3.84	3.69	4.70	5.01	5.08
Household appliances	0.42	108.81	110.06	110.76	110.16	110.67	111.16	111.51	110.09	110.10	110.12	112.09	113.09	113.20	113.52	1.18	0.04	-0.58	1.75	2.19	1.83	1.81
Glassw are, tablew are & utensils	0.25	126.43	125.23	121.33	123.65	129.19	133.12	131.10	133.15	133.23	133.19	134.24	136.65	136.84	136.91	5.32	6.39	9.78	8.56	5.77	2.80	4.44
Tools and equipments for house and garden	0.24	115.31	115.63	118.50	117.00	115.81	116.06	116.39	113.44	113.58	113.27	113.97	116.18	116.35	116.30	-1.62	-1.77	-4.41	-2.59	0.32	0.24	-0.08
Goods and services for household maintenance	0.35	111.88	113.80	114.74	115.73	113.83	115.89	117.17	116.77	116.91	116.94	117.08	118.17	118.49	118.55	4.37	2.73	1.92	1.17	3.81	2.24	1.18
Purchase of vehicles	4.58	100.00	100.00	100.00	100.00	100.00	100.00	100.00	131.96	131.96	131.96	131.96	137.09	137.09	137.09	31.96	31.96	31.96	31.96	37.09	37.09	37.09
Fuels & Lubricants	3.11	108.63	107.75	107.75	108.17	109.30	109.43	109.05	111.50	109.76	108.10	106.69	105.90	103.75	105.87	2.65	1.87	0.32	-1.37	-3.12	-5.19	-2.92
Telephone and telefax equipment	0.17	103.84	92.64	92.64	92.64	95.84	95.74	95.25	91.86	92.42	92.42	92.42	92.42	92.42	92.42	-11.54	-0.23	-0.23	-0.23	-3.56	-3.47	-2.96
Audio-visual, photographic & information processing equipments	0.48	107.06	105.43	105.43	105.43	107.14	112.69	110.38	107.03	107.03	107.03	107.03	107.18	107.18	107.34	-0.03	1.52	1.52	1.52	0.04	-4.89	-2.75
Recreational & cultural services	0.92	99.77	99.77	99.77	99.66	99.84	99.85	99.32	100.04	100.04	100.04	100.05	100.04	100.04	100.04	0.27	0.27	0.27	0.39	0.20	0.20	0.73
New spapers, books & stationery	0.72	116.73	116.75	116.76	116.79	116.95	118.68	117.74	119.43	119.43	119.52	119.88	121.34	121.37	122.20	2.31	2.30	2.37	2.64	3.76	2.27	3.78
Catering services	1.05	114.31	114.31	114.31	114.31	111.71	111.57	111.67	112.33	112.33	112.48	113.51	116.94	116.94	118.26	-1.73	-1.73	-1.60	-0.71	4.68	4.81	5.91
Accommodation services	0.19	120.48	120.48	120.48	120.48	120.63	120.63	120.63	127.95	127.95	127.95	128.08	128.08	128.31	130.04	6.20	6.20	6.20	6.31	6.17	6.36	7.80
Personal care	1.59	109.07	109.71	109.98	111.06	110.69	113.37	112.52	115.42	115.56	115.52	116.17	117.48	117.67	117.62	5.82	5.33	5.03	4.59	6.13	3.79	4.54
Personal effects n.e.c	0.47	134.23	134.23	134.23	134.23	133.76	134.31	134.11	132.48	132.50	132.64	132.64	133.79	135.47	135.64	-1.30	-1.29	-1.19	-1.19	0.02	0.86	1.15

		Ta	ble 7: N	Month-	on-Mo	nth In	dex & I	Percen	t Chan	ge in th	ne CPI (	Natio	nal)							
					Index	(Decem	ber 2012	=100)							Perc	ent Cha	nge(%)			
Graun					2014					2015			,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	20	14	,			2015	
Group	Weights	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar
Food	39.92	118.81	119.80	120.25	120.90	120.98	121.39	121.42	121.04	121.11	121.12	0.84	0.38	0.54	0.07	0.34	0.02	-0.31	0.05	0.01
Non-Food	60.08	112.10	115.54	116.56	116.90	117.04	116.91	117.36	118.17	118.59	118.81	3.07	0.89	0.29	0.12	-0.11	0.38	0.69	0.36	0.19
Overall	100.00	114.73	117.22	118.02	118.48	118.60	118.68	118.96	119.31	119.59	119.73	2.17	0.68	0.39	0.10	0.07	0.24	0.29	0.23	0.12
Purchasing Power of Ngultrum (N	ı.)	87	85	85	84	84	84	84	84	84	84									
Table 8: Month-on-Month Index (Domestic)  Index (December 2012=100)  Percent Change (%)																				
	Index (December 2012=100)														Perce	ent Char	nge (%)			
Graun					2014					2015				20	14				2015	
Group	Weights	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar
Food	17.15	119.84	120.97	121.02	121.17	121.31	121.82	122.07	121.89	122.15	122.06	0.94	0.04	0.12	0.12	0.42	0.21	-0.15	0.22	-0.08
Non-Food	30.24	113.48	115.22	116.51	116.58	116.92	116.93	117.59	117.84	118.58	118.64	1.53	1.13	0.05	0.30	0.01	0.56	0.21	0.63	0.05
Domestic	47.39	115.74	117.27	118.12	118.22	118.49	118.68	119.19	119.29	119.86	119.87	1.32	0.73	0.08	0.23	0.16	0.43	0.08	0.48	0.005
				Ta	ıble 9: I	Month	-on-M	onth P	ercent	Change	e in the	e CPI (I	Impor	t)						
					Index	(Decem	ber 2012	=100)							Perce	ent Char	1ge (%)			
Group					2014					2015				20	14				2015	
Group	Weights	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar
Food	22.77	118.22	119.14	119.92	120.97	121.03	121.39	121.27	120.75	120.67	120.76	0.78	0.65	0.88	0.05	0.30	-0.10	-0.43	-0.07	0.07
Non-Food	29.84	110.71	115.86	116.61	117.22	117.16	116.89	117.12	118.51	118.60	118.98	4.65	0.65	0.52	-0.05	-0.23	0.20	1.19	0.07	0.32
Import	52.61	113.90	117.27	118.03	118.83	118.82	118.82	118.90	119.48	119.49	119.75	2.96	0.65	0.68	-0.01	0.00	0.07	0.49	0.01	0.22

GRAPH 2: MONTH-TO-MONTH INFLATION RATE (OVERALL, DOMESTIC AND IMPORTED)

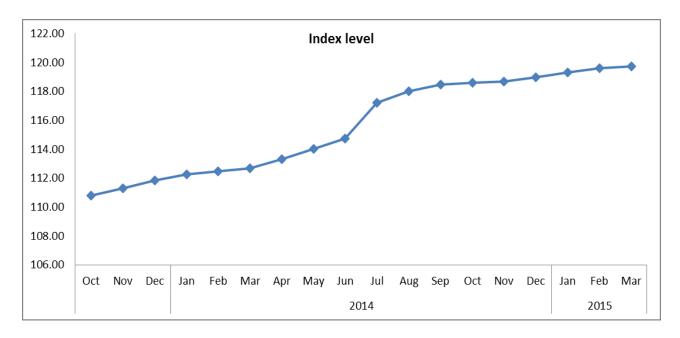


# **MONTH-TO-MONTH INFLATION RATE**

The Month-to-Month inflation for March over previous month of February was 0.12%. Food price has risen by 0.01% and Non-Food by 0.19% over the previous month.

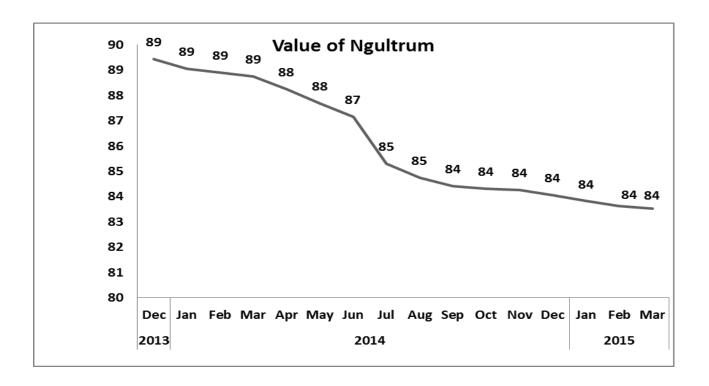
Prices for domestic goods and services increased by 0.005% on average over the previous month with corresponding increase in Non-food and food prices by 0.05% and -0.08% respectively. Imported goods increased by 0.22% only due to increase in food prices by 0.07% and Non-food price by 0.32%.

**GRAPH 3: TIME SERIES INDEX LEVEL TREND** 



				Ta	able 10	0: Pur	chasin	g Pow	er of	Ngult	rum				
2013						201	L4							2015	
Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar
89	89	89	89	88	88	87	85	85	84	84	84	84	84	84	84

# **GRAPH 4: PURCHASING POWER OF NGULTRUM (PPN)**



The PPN, as measured by CPI was 84 Ngultrum as of March 2015. This means, Ngultrum 100 in March 2015 is worth only Ngultrum 84 at December 2012 prices. The PPN has decreased by 5.90 percent in the past 12 months (i.e. from March 2014 to March 2015) due to price rise in the economy.

# **TECHNICAL NOTES**

# 1. concept and Definition of CPI

The Consumer Price Index (CPI) is a measure of changes in the average retail prices of a market basket of goods and services purchased by households for day-to-day living. It shows how much, on average, prices of goods and services have increased or decreased from a particular reference period, commonly known as the base period.

### 2. Uses of CPI

- ✓ As an economic indicator: CPI is one of the major indicators that determine the effectiveness of an economic policy. It is used to formulate fiscal and monetary policies and monitor their effect on the overall economy. Business executives, labor leaders, and other private citizens use CPI as a guide to make economic decisions.
- ✓ As a means of adjusting income payments: -Many collective bargaining agreements use CPI to determine wage rates, and index various payments to adjust the effects of inflation.
- ✓ As a deflator of economic series: CPI or its components is used as a deflator to adjust for price changes in various economic data series (e.g., GDP).

### 3. Weights

The weights reflect the relative importance or contribution to the total consumption expenditures of all households. It is determined using the spending patterns of households during some previous weight reference period.

It is important for the weights to reflect the current consumption patterns of the household. The more current the weights, the more reflective they are of current consumer spending patterns. The international standards recommend rebasing CPI every 5 years.

The current CPI weights were updated in 2012 following the conduct of the Bhutan Living Standard Survey (BLSS) in March – May 2012. Expenditure details were broken down into imported and domestic goods to facilitate calculation of domestic and imported inflation.

#### 4. Reference Period

There is no single "base period" for a price index. It can mean different things to different users. In practice, there are three "reference periods" used.

✓ Weight Reference Period is the period during which household consumption values are

collected. The weight-reference period for the new rebased CPI is 2012, that is, the period when the BLSS was conducted.

- ✓ Index Reference Period is the period when the index is set to 100. In the new CPI, the index reference period is December 2012.
- ✓ Price Reference Period is the period of the first price of each product used to calculate the elementary indices (indices for individual CPI items). The price reference period for the new CPI is the fourth Quarter 2012.

### 5. Index Calculation Formula

Geometric Modified Laspeyres formula is used to calculate the CPI:

$$P_{GYo} = \prod_{i=1}^{n} \left( \frac{P_i^t}{P_i^0} \right)^{s_i^b}$$

 $S_i^b$  = Expenditure Shares of the Base Period (weight from BLSS)

 $P_i^t$  = Current Period Price

 $P_i^o$  = Previous Period Price

 $\left(\frac{P_i^t}{P_I^o}\right) = \text{Price Relatives}$ 

#### 6. Market Basket

Market basket refers to a sample of goods and services which is representative of all goods and services purchased by the households. The present market basket has 436 items, as compared to 363 items in the previous CPI basket. The new re-based CPI uses the Classification of Individual Consumption According to Purpose (COICOP). The 12 major groups are:

- 1. Food and Non-Alcoholics Beverages;
- 2. Alcoholic Beverages & Narcotics;
- 3. Clothing and Footwear;
- 4. Housing, Water, Electricity, Gas and Other Fuels;
- 5. Furnishing, Household Equipment and Routine Household Maintenance;
- 6. Health;
- 7. Transport;
- 8. Communication;
- 9. Recreation and Culture;
- 10. Education;
- 11. Restaurant and Hotels;
- 12. Miscellaneous Goods and Services.

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