

# NREGS: Interpreting the Official Statistics

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The performance of the National Rural Employment Guarantee Scheme, even as revealed by government statistics, has been disappointing and, if anything, has deteriorated over time. Using official data, this article evaluates the NREGS according to the average number of days of employment per household, the percentage of households completing 100 days of employment, the percentage of expenditure against total available funds, and the percentage of work completed. The performance across the first two criteria has been disappointing and the average number of days of employment per household has declined over time. The percentage of expenditure against total available funds has risen sharply, particularly since 2010-11, and has been consistently higher than the work completed as a percentage of the work planned.

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## 1 Introduction

The National Rural Employment Guarantee Scheme (NREGS) has been hailed as India's most ambitious anti-poverty intervention. The legislation for the job guarantee scheme was enacted on 25 August 2005 and it was launched on 2 February 2006. It guarantees 100 days of employment a year to at least one member of any rural household who is willing to perform unskilled labour for the minimum wage. By combining rural development with livelihood protection, the work is designed to develop infrastructure such as roads, irrigation and flood protection measures. Beginning with the poorest 200 districts, the NREGS became a nationwide programme in April 2008. It was expected to generate two billion days of employment in its first year of operation. The NREGS' performance is crucial to the success of the Millennium Development Goal of halving poverty between 1990 and 2015.

In the budget of 2012-13, the amount set aside for the NREGS was Rs 40,000 crore. Although there has been earmarking of the class of projects that can be taken up by NREGS workers, it has never been made clear how the results of the work will be assessed. No cost-benefit analysis or impact assessment has been done so far.

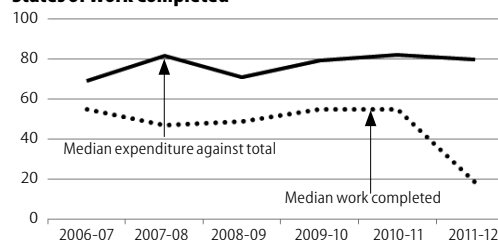
Against this backdrop, it is important to ask three key questions (a) how much benefit has accrued from this programme to eligible workers; (b) have these benefits persisted over time; and (c) how much, and what type of, work has been completed using NREGS labour and how useful it has been?

The first issue can be addressed using household-level cross section data and some dimensions have been addressed in a series of papers for selected states

(Jha et al 2009, 2012a for employment, Jha et al 2011a for nutritional impact and Jha et al 2012b for net transfers).<sup>1</sup> The second issue can only be addressed using household-level panel data to track the movement of workers in and out of employment in the NREGS. Jha et al (2011b) provide some evidence on this using household-level panel data for Rajasthan. This article addresses the third question. In doing so, we rely on the government's own reports on the NREGS (GOI 2012a) for 2009-10 and 2011-12. The 2009-10 report contains data from April 2009 to December 2010 and the 2011-12 report contains data from April 2011 to December 2011. We also use data reported by the Ministry of Rural Development for 2006-07 to 2011-12 (GOI 2012b).

We analyse the results according to four criteria (1) the average number of days of employment per household; (2) the percentage of households completing 100 days of employment under the NREGS; (3) the percentage of expenditure against total available funds; and (4) the percentage of work completed. The first two criteria are addressed using data from the Ministry of Rural Development's "Report to the People" (GOI 2012a), whereas the third and fourth criteria are addressed using data

**Figure 1: Median across States of Actual Expenditure as a Percentage of Planned Expenditure vs Median across States of Work Completed**



from another report by the same ministry (GOI 2012b). In Section 2 we report on the results and Section 3 concludes with some policy recommendations.

## 2 Results

Despite rapid economic growth in recent years, India's unemployment problem remains well-entrenched. The National Sample Survey estimated aggregate unemployment at 8.28% on a current daily status (CDS) basis for 2004-05 but the first survey on employment and unemployment (GOI 2010) estimated unemployment in

the economy as a whole at 9.4% in 2009-10, with 7.3% in urban areas and a staggering 10.1% in rural areas. In addition, a large part of the Indian labour force is underemployed. So, if implemented properly, the NREGS should help meet a basic need in rural India.

However, the performance of the NREGS, even as revealed by government statistics, has been disappointing and, if anything, deteriorated over time. Data on the average number of days of employment per household are available only for nine months (April to December) of 2009-10

and 2011-12. Table 1 indicates the average person days of employment under the NREGS per household in India as a whole and various states in 2009-10 and 2011-12. The data are arranged in ascending order.

For the country as a whole, average person days of employment fell from 46.83 in 2009-10 to 32 in 2011-12. Across the states of India, the median, mode and standard deviation were all lower in 2011-12. The lowest (highest) number of days of employment was 14 (68) in 2009-10 and 6 (55) in 2011-12.

Data on the percentage of households completing 100 days of employment are available only for nine months (April to December) of 2009-10 and 2011-12.<sup>2</sup> Table 2 shows that the percentage of households completing 100 days of employment went up sharply from 7.08 in 2009-10 to 32 in 2011-12. However, across the states, the median was only slightly higher at 2.15, whereas there was a sharp fall in the standard deviation. The mode was 0% in both years.

Since agriculture is a seasonal operation, the results based on data for nine

**Table 1: Average Person Days of Employment under NREGS Per Household**

	2009-10 (for Nine Months Ending December 2009)		2011-12 (for Nine Months Ending December 2011)
Arunachal Pradesh	14	Arunachal Pradesh	6
Puducherry	20	West Bengal	14
Goa	21	Puducherry	20
Kerala	22	Assam	21
Andaman and Nicobar	22	Punjab	22
Dadra and Nagar Haveli	22	Manipur	23
Punjab	25	Goa	26
Lakshwadeep	26	Kerala	28
West Bengal	28	Odisha	29
Gujarat	29	Andaman and Nicobar	29
Assam	30	Karnataka	30
Haryana	32	Uttar Pradesh	30
Odisha	32	Bihar	31
Uttarakhand	32	Haryana	31
Jammu and Kashmir	35	Jammu and Kashmir	31
Meghalaya	38	Meghalaya	31
Maharashtra	41	Uttarakhand	31
Sikkim	45	Jharkhand	32
Chhattisgarh	46	India	32
Himachal Pradesh	46	Gujarat	33
Tripura	46	Madhya Pradesh	33
India	46.83	Chhattisgarh	34
Jharkhand	49	Tamil Nadu	34
Karnataka	50	Maharashtra	35
Madhya Pradesh	50	Lakshwadeep	35
Andhra Pradesh	51	Rajasthan	36
Uttar Pradesh	51	Mizoram	37
Manipur	55	Himachal Pradesh	40
Tamil Nadu	58	Andhra Pradesh	41
Mizoram	62	Sikkim	41
Rajasthan	65	Tripura	55
Nagaland	68	Nagaland	NR
Daman and Diu	NR	Dadra and Nagar Haveli	NR
Chandigarh	NR	Daman and Diu	NR
Bihar	NR	Chandigarh	NR
2009 (Summary statistics across states)		2011 (Summary statistics across states)	
Mean = 39.06		Mean = 30.63	
Median = 38		Median = 31	
Standard deviation = 14.7		Standard deviation = 8.89	
Mode = 46		Mode = 31	

NR = not reported.

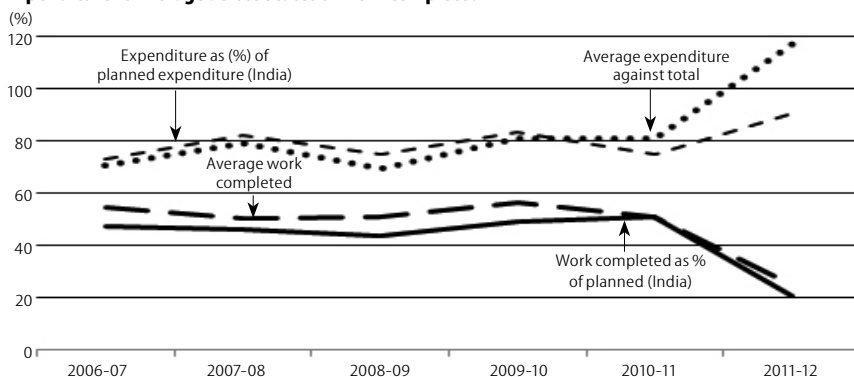
Source: NREGA website, Ministry of Rural Development.

**Table 2: Percentage of Households Completing 100 Days of Employment under NREGS**

	2009-10 (for Nine Months Ending December 2009)		2011-12 (for Nine Months Ending December 2011)
Arunachal Pradesh	0	Arunachal Pradesh	6
Kerala	0	West Bengal	14
Manipur	0	Puducherry	20
Meghalaya	0	Assam	21
Mizoram	0	Punjab	22
Nagaland	0	Manipur	23
Punjab	0	Goa	26
Uttarakhand	0	Kerala	28
West Bengal	0	Odisha	29
Andaman and Nicobar	0	Andaman and Nicobar	29
Dadra and Nagar Haveli	0	Karnataka	30
Goa	0	Uttar Pradesh	30
Lakshwadeep	0	Bihar	31
Tripura	1	Haryana	31
Puducherry	1	Jammu and Kashmir	31
Odisha	2	Meghalaya	31
Sikkim	2	Uttarakhand	31
Assam	3	Jharkhand	32
Chhattisgarh	3	India	32
Haryana	3	Gujarat	33
Himachal Pradesh	3	Madhya Pradesh	33
Maharashtra	3	Chhattisgarh	34
Gujarat	4	Tamil Nadu	34
Jharkhand	5	Maharashtra	35
Tamil Nadu	5	Lakshwadeep	35
Jammu and Kashmir	6	Rajasthan	36
Madhya Pradesh	7	Mizoram	37
Uttar Pradesh	7	Himachal Pradesh	40
India	7.08	Andhra Pradesh	41
Karnataka	9	Sikkim	41
Andhra Pradesh	14	Tripura	55
Rajasthan	15	Nagaland	NR
Daman and Diu	NR	Dadra and Nagar Haveli	NR
Chandigarh	NR	Daman and Diu	NR
Bihar	NR	Chandigarh	NR
2009 (Summary statistics across states)		2011 (Summary statistics across states)	
Mean = 3		Mean = 3	
Median = 2		Median = 2.15	
Standard deviation = 3.99		Standard deviation = 1.94	
Mode = 0		Mode = 0	

NR = not reported.

Source: NREGA website, Ministry of Rural Development.

**Figure 2: Average across States and India of Actual Expenditure as a Percentage of Planned Expenditure vs Average across States of Work Completed****Table 3: Actual Expenditure (Percentage) against Planned Expenditure**

	2006-07	2007-08	2008-09	2009-10	2010-11	2011-12	Mean (2006-12)	Median (2006-12)	SD (2006-12)
Andhra Pradesh	59.55	90.87	82.87	93.65	59.81	1472.94	309.95	86.87	569.94
Arunachal Pradesh	18.27	81.59	105.37	78.38	95.62	1.36	63.43	79.98	42.99
Assam	83.73	68.12	72.13	78.78	72.84	89.21	77.47	75.81	7.95
Bihar	59.84	69.02	62.79	82.08	81.46	93.63	74.80	75.24	13.07
Gujarat	69.38	64.54	69.69	78.21	62.09	70.13	69.01	69.53	5.56
Haryana	77.26	90.22	68.61	75.82	89.40	115.27	86.10	83.33	16.55
Himachal Pradesh	68.89	77.80	66.34	92.33	69.53	81.04	75.99	73.67	9.81
Jammu and Kashmir	68.92	63.76	60.01	88.97	88.92	39.66	68.37	66.34	18.77
Karnataka	72.75	54.16	55.70	120.39	109.84	114.12	87.83	91.29	30.43
Kerala	57.70	83.59	75.42	79.76	83.52	96.10	79.35	81.64	12.65
Madhya Pradesh	87.30	87.93	73.38	66.84	70.78	69.60	75.97	72.08	9.26
Maharashtra	35.86	37.98	56.80	52.91	60.14	109.70	58.90	54.86	26.80
Punjab	65.12	59.76	63.00	71.69	73.09	79.64	68.72	68.41	7.39
Rajasthan	80.95	102.54	88.65	78.73	53.62	72.76	79.54	79.84	16.32
Sikkim	57.37	82.78	88.87	62.49	102.13	64.38	76.34	73.58	17.66
Tamil Nadu	60.15	73.65	55.95	73.04	82.67	81.39	71.14	73.35	10.95
Tripura	90.56	95.47	95.48	75.82	99.04	93.74	91.68	94.61	8.25
Uttar Pradesh	75.79	85.23	77.70	86.50	81.59	81.33	81.36	81.46	4.14
West Bengal	62.62	75.43	73.51	90.71	91.44	97.34	81.84	83.07	13.35
Chhattisgarh	79.53	92.37	72.68	81.79	73.17	81.60	80.19	80.57	7.20
Jharkhand	72.44	84.69	57.14	72.00	78.40	70.64	72.55	72.22	9.20
Uttarakhand	68.25	62.50	77.44	81.16	93.79	89.17	78.72	79.30	11.97
Manipur	99.41	97.83	109.85	98.82	97.04	38.62	90.26	98.33	25.73
Meghalaya	81.74	79.68	75.28	84.38	95.82	82.39	83.21	82.06	6.91
Mizoram	63.24	91.41	94.43	97.47	95.69	52.45	82.45	92.92	19.46
Nagaland	91.33	99.28	101.88	98.23	95.23	65.83	91.96	96.73	13.31
Odisha	82.39	71.74	64.52	93.93	85.65	75.20	78.91	78.80	10.54
Puducherry	NR	NR	17.16	72.66	35.44	51.13	44.10	43.28	23.56
Andaman and Nicobar	NR	NR	20.94	80.90	75.39	80.43	64.42	77.91	29.09
Lakshwadeep	NR	NR	41.06	76.87	66.29	65.08	62.32	65.69	15.13
Dadra and Nagar Haveli	NR	NR	65.61	67.97	96.84	0.00	57.60	66.79	40.94
Goa	NR	NR	20.57	39.14	61.71	76.65	49.52	50.43	24.70
Mean	70.01	78.66	69.088	80.38	80.56	117.26	82.66	79.52	17.703
Median	69.38	81.59	70.91	79.27	82.13	80.035	77.21	79.65	5.59
SD	16.89	15.28	22.46	14.73	16.57	248.79	55.79	16.73	94.59
India	73.08	82.26	75.07	82.99	74.79	90.34	79.75	78.66	6.63

NR = not reported.

Source: Computed from NREGA website, Ministry of Rural Development.

months in Tables 1 and 2 cannot be extrapolated to cover 12 months. However, the National Rural Employment Guarantee Act (NREGA) website does not give information on the average number

of days worked per household and the percentage of households working for the full 100 days in a year.

In Table 3 we report on the percentage of expenditure of funds set aside for six

years – 2006-07 to 2011-12 – by various states and the country as a whole. Also presented are the values<sup>3</sup> of the mean, median and standard deviation across states for each year as well as for each state and India for the period 2006-12.

Table 4 (p 21) reports similar statistics on completed work against planned work over the six years (2006-12) in various states and the country as a whole.

The key aspects of Tables 3 and 4 are summarised in Figure 1 (p 18) and Figure 2.

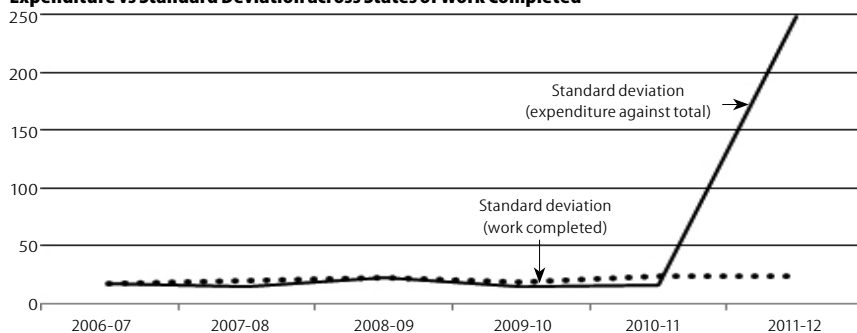
Figure 1 shows the median percentage across states of actual expenditure as a percentage of planned expenditure versus the median percentage across states of work completed. Whereas the median actual expenditure rose steadily (except for 2008-09 when it fell marginally perhaps in response to the budgetary pressures emanating from the global financial crisis), the median work completed has always been lower than the median expenditure. Further, the median work completed fell sharply between 2010-11 and 2011-12, indicating a divergence of the two trends.

These basic trends in Figure 1 are confirmed in Figure 2, which shows the mean percentage across states and India of actual expenditure as a percentage of planned expenditure versus the mean percentage across states and India of work completed. Once again, there has been a divergence in the trends of the two series.

The jump in the mean expenditure across states is further confirmed in Figure 3 (p 21), which plots the standard deviation of expenditure across states against the standard deviation of work completed across states. Whereas the standard deviation of work completed as a share of total work has remained relatively unchanged, there has been a sharp jump in the standard deviation of actual expenditure against planned expenditure. The latter has been dominated essentially by Andhra Pradesh, where actual expenditure as a percentage of total expenditure was exceptionally high in 2011-12.

### 3 Conclusions

This article has assessed India's NREGS according to four criteria (1) the average number of days worked per household;

**Figure 3: Standard Deviation across States of Actual Expenditure as a Percentage of Planned Expenditure vs Standard Deviation across States of Work Completed****Table 4: Completed Work (Percentage) against Planned Work**

	2006-07	2007-08	2008-09	2009-10	2010-11	2011-12	Mean (2006-12)	Median (2006-12)	SD (2006-12)
Andhra Pradesh	39.57	38.63	31.24	51.96	67.25	2.15	38.47	39.10	21.83
Arunachal Pradesh	80.04	94.35	33.13	44.58	37.73	0.00	48.31	41.16	34.11
Assam	61.78	53.47	41.73	41.99	34.20	17.05	41.70	41.86	15.53
Bihar	48.09	51.40	50.82	45.73	40.68	0.23	39.49	46.91	19.63
Gujarat	37.22	67.48	69.72	88.86	53.07	29.12	57.58	60.28	22.22
Haryana	59.62	59.77	55.70	52.73	58.75	70.09	59.44	59.19	5.88
Himachal Pradesh	54.11	47.04	48.91	57.46	54.58	44.76	51.14	51.51	4.96
Jammu and Kashmir	36.87	45.49	54.95	63.42	65.12	3.77	44.94	50.22	22.84
Karnataka	59.03	68.91	60.90	22.86	20.93	19.61	42.04	40.94	23.16
Kerala		82.80	88.30	51.52	71.04	92.38	77.21	82.80	16.45
Madhya Pradesh	48.80	39.82	40.36	44.05	42.38	14.56	38.33	41.37	12.09
Maharashtra	48.88	34.88	42.96	42.58	38.02	2.52	34.97	40.30	16.60
Punjab	56.40	24.76	26.40	53.28	45.47	40.13	41.07	42.80	13.31
Rajasthan	39.78	28.61	42.54	45.39	26.25	7.79	31.72	34.19	14.01
Sikkim	65.19	39.11	47.16	67.01	66.29	18.38	50.52	56.17	19.55
Tamil Nadu	32.94	45.05	32.58	38.71	45.16	19.82	35.71	35.83	9.54
Tripura	82.60	88.72	91.93	26.61	90.98	73.53	75.73	85.66	25.02
Uttar Pradesh	65.34	69.09	61.23	65.86	59.59	36.31	59.57	63.28	11.89
West Bengal	56.39	47.95	54.49	66.41	58.12	40.44	53.97	55.44	8.91
Chhattisgarh	49.61	64.05	53.43	56.39	57.15	29.33	51.66	54.91	11.93
Jharkhand	37.68	31.08	40.85	47.11	20.26	17.32	32.38	34.38	11.77
Uttarakhand	61.02	57.49	51.03	66.74	70.49	17.15	53.99	59.26	19.30
Manipur	55.79	9.37	74.56	81.26	89.62	0.00	51.77	65.17	38.25
Meghalaya	29.07	50.22	48.83	62.77	55.25	19.74	44.31	49.53	16.44
Mizoram	82.13	45.36	73.31	82.10	85.34	8.48	62.79	77.71	30.40
Nagaland	96.88	36.87	83.20	63.44	84.86	7.78	62.17	73.32	33.95
Odisha	36.50	30.51	7.04	12.53	26.83	32.09	24.25	28.67	11.76
Puducherry	NR	NR	100.00	97.27	0.15	4.99	50.60	51.13	55.51
Andaman and Nicobar	NR	NR	47.14	69.28	65.91	59.67	60.50	62.79	9.75
Lakshwadeep	NR	NR	23.45	79.61	0.00	0.00	25.76	11.73	37.56
Dadra and Nagar Haveli	NR	NR	0.00	47.83	22.58	NR	23.47	22.58	23.93
Goa	NR	NR	NR	63.83	73.55	32.18	56.52	63.83	21.63
Mean	54.66	50.08	50.89	56.28	50.86	24.56	47.88	50.87	11.68
Median	54.95	47.04	48.91	54.83	54.91	18.38	46.50	51.87	14.20
SD	17.06	19.85	22.79	18.59	23.95	23.73	20.99	21.32	2.893
India	47.15	46.04	43.76	48.94	50.88	20.25	42.83	46.59	11.33

NR = not reported.

Source: Computed from NREGA website, Ministry of Rural Development.

(2) the percentage of households completing 100 days of employment; (3) the percentage of allocated funds spent; and (4) the percentage of work completed. The performance across all four criteria has been disappointing and, except for the percentage of households completing 100 days of employment, has deteriorated over time.

It is difficult to escape the conclusion that the NREGS has not performed well. In these days of very high fiscal and current account deficits, it is difficult to rationalise providing more funds to this initiative. Documents of the 2012-13 budget (GOI 2012) reveal that in 2011-12 the fertiliser subsidy was Rs 62,301.21 crore, the food subsidy was Rs 63,843.79

crore, and the petroleum subsidy was 38,371.32 crore. When these figures are juxtaposed against the nearly Rs 17,000 crore that was the unspent amount in the NREGS budget in 2011-12 (*Economic Times* 2011), it is evident that this alone amounted to almost 44% of the fuel subsidy. This is a stark manifestation of the failure in designing and implementing projects that are appropriate and likely to have a substantial impact on the village economy. Another serious failure is the tiny fraction of households availing themselves of the mandated 100 days of work despite an attractive wage rate, far in excess of prevailing agricultural wage rates.

Reports abound of corruption at all stages with participants obtaining wages, often long delayed, unrelated to the work done. Project activity is dull or highly uneven with earmarked funds being siphoned off. Village panchayats and local officials are not silent or helpless observers of the gravy train, but key to keeping it going. Even though official claims of higher agricultural wage rates and lower migration are mostly exaggerated, if not fabricated, field reports suggest a growing sense of entitlement among the deprived. For this reason alone, the temptation to scrap NREGS must be resisted. Instead, a solution lies in a drastic overhaul of this scheme with greater transparency and accountability through social audits. The new guidelines announced by the Ministry of Rural Development are a substantive response to these concerns. But whether the impact on the poor will be much greater, in particular to justify the expenditure on the programme, time alone will tell.

**NOTES**

- 1 Shankar and Gaiha (2012) blend economic and ethnographic arguments to provide further evidence on the impact of the NREGS on the poor.
- 2 Data for the intermediate year 2010-11 is not available for the variables discussed in Tables 1 and 2 on this website.
- 3 Values for the mean, median and standard deviation are each unweighted corresponding magnitudes across states.

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