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14.74 Foundations of Development Policy
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Challenges of Development: How do the poor live?

14.74, lecture 2, February 9, 2009

A data description project

(based on work with Abhijit Banerjee)

Data

- Bringing together data on the **very poor**, defined as those with consumption below \$1.08 (\$1) a day at 1993 PPP.
 - The **poor** defined as those below \$2 a day at 1993 PPP
 - The **Middle class** defined as those between \$2 and \$4 dollars a day, or \$6 and \$10
 - From a number of detailed households surveys (LSMS, RAND, our own data).
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Topics

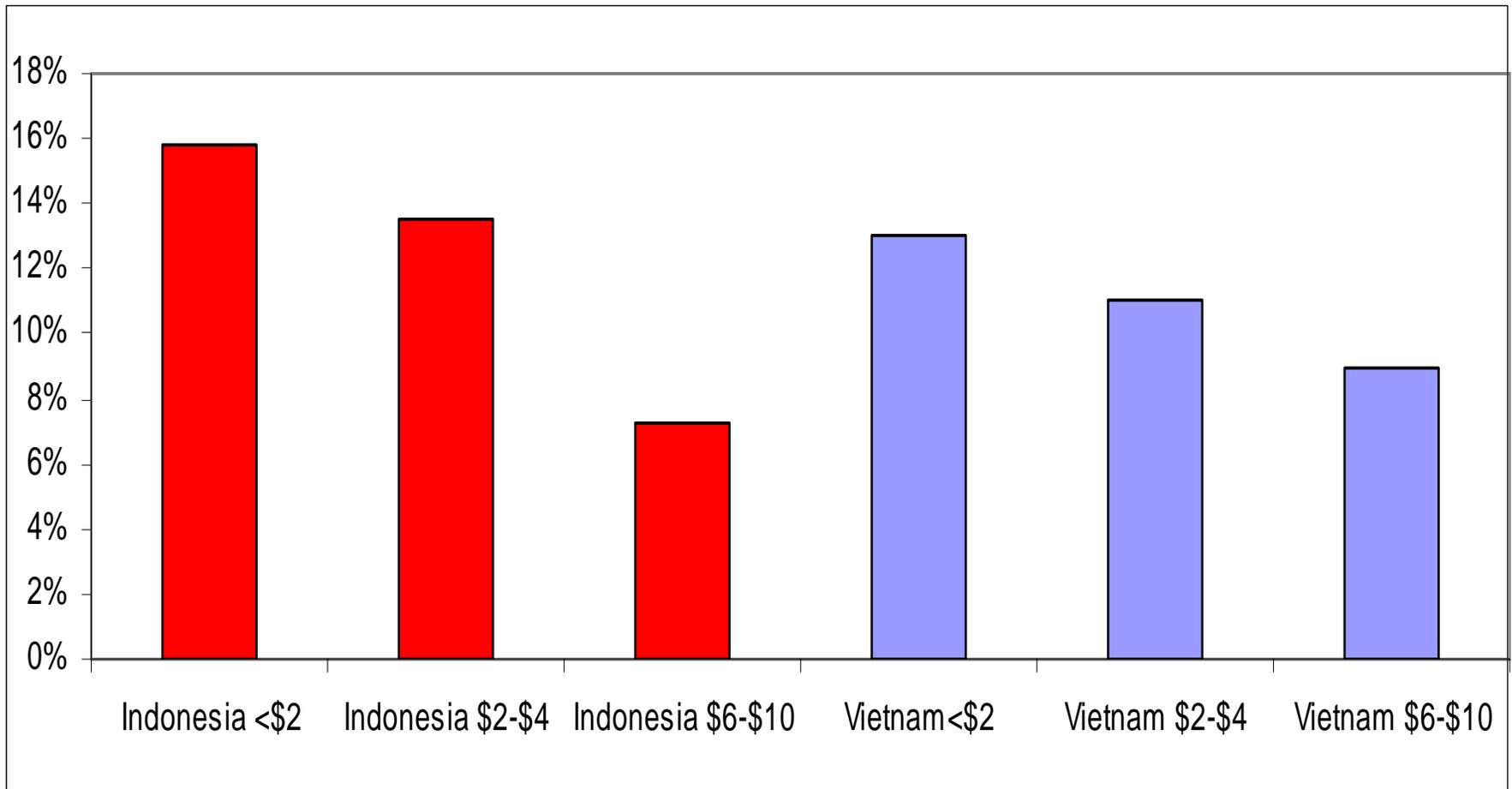
- The demographic structure
 - How do the poor spend their money?
 - What are their living conditions (houses, health, etc.)?
 - How do they earn their money?
 - How is it different from the middle class?
 - What are the main puzzles that emerge from this portrait?
 - Does this provide support for the “messiahs” or the “romantics” view of the poor? : bringing more evidence from field experiment
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The Demographic Structure

The demographic structure

- Large families
 - Many young people
 - Not many old people or among the poor
 - Higher mortality?
 - Or lower fertility?
 - Can you tell from this data? Why or why not?
 - Ways to tell:
 - Missing grandparents
 - Panel data: probability of dying
 - Direction of causality??
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Probability of death after 5 years, conditional on being alive at age 50



Question on demographics?

How do the poor spend their money?

Food?

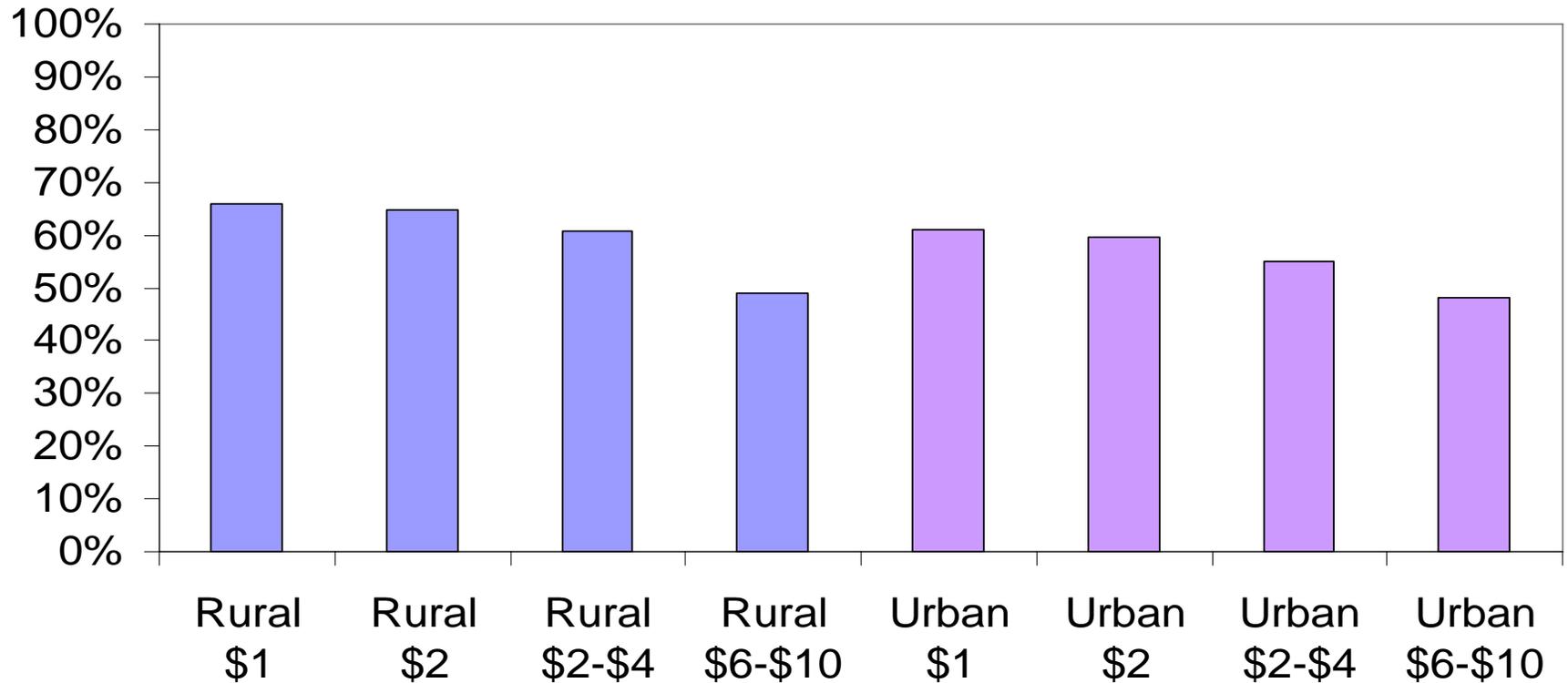
- Food is the first place where people are looking for poverty traps (e.g Abu).
 - Are the very poor spending every marginal penny they can on getting more food?
 - The share of expenditure between 78% in Papua New Guinea and 50% in Mexico.
 - Other large items include:
 - Tobacco/alcohol (up to 8%)
 - Festivals (up to 14% when asked in detail)
 - They could easily spend more on food.
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How the poor spend their money

	As a Share of Total Consumption			
	<u>Food</u>	<u>Alcohol/ Tobacco</u>	<u>Education</u>	<u>Health</u>
Living on less than \$1 a day				
Rural				
Cote d'Ivoire	64.4%	2.7%	5.8%	2.2%
Guatemala	65.9%	0.4%	0.1%	0.3%
India - Udaipur	56.0%	5.0%	1.6%	5.1%
Indonesia	66.1%	6.0%	6.3%	1.3%
Mexico	49.6%	8.1%	6.9%	0.0%
Nicaragua	57.3%	0.1%	2.3%	4.1%
Pakistan	67.3%	3.1%	3.4%	3.4%
Panama	67.8%		2.5%	4.0%
Papua New Guinea	78.2%	4.1%	1.8%	0.3%
Peru	71.8%	1.0%	1.9%	0.4%
South Africa	71.5%	2.5%	0.8%	0.0%
Timor Leste	76.5%	0.0%	0.8%	0.9%

Engel curves?

Percentage of Household Budget spent on Food



How the poor spend their money

Living on less than \$1 a day Rural	<u>Entertainment</u>	<u>Festivals</u>	<u>% HHs with any Festival Expenditure</u>
	Cote d'Ivoire	0.0%	1.3%
Guatemala		0.1%	7.7%
India - Udaipur	0.0%	14.1%	99.4%
Indonesia	0.0%	2.2%	80.3%
Mexico	0.7%	0.0%	2.7%
Nicaragua	0.0%	0.0%	1.8%
Pakistan	0.3%	2.4%	64.8%
Panama	0.6%	0.0%	0.0%
Papua New Guinea	0.2%	1.5%	21.7%
Peru	0.0%		
South Africa	0.1%	3.2%	90.3%
Timor Leste	0.0%	0.0%	49.0%

Choice?

- Deaton and Subramanian also show that the poor spend 30% of their food budget on rice and wheat which cost between 70% and 100% more per calorie than other grains
 - They also spend 7% on sugar
 - They could buy almost 30% more calories without spending more.
 - Deaton and Dreze (2008) As the poor in India are becoming richer, the consumption of calories (and of any nutrients except fat) is decreasing.
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Are the poor eating “enough”?

- Deaton and Dreze (2008) find that 76% of Indians live in households where the average per capita calorie consumption is below the recommended levels (2,400 rural, 2,100 urban)
 - Average body mass index is 17.8 in Udaipur compared to a cut-off for under-nourished of 18.5 & 55% are anemic.
 - 46.7% of children have “low weight for age”
 - In Udaipur:
 - in the last year 37% of the very poor households the adults starved for an entire day.
 - 45% cut the size of their meals
 - Only 57% report that they have enough to eat throughout the year
 - Those families that report missing meals are 0.23 standard deviations less well-being
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Education

- Fraction of children in school increase fast with income
 - Share of income spent on education is higher in urban area
 - Share of income spent on education constant or increase with income:
 - Money spent for each child increases a lot (income is much higher, fewer kid to educate)
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Questions on consumption?

Savings and Accumulation

Assets and Savings

- In the median country a majority of the rural poor own land.
 - Other than that they own very little: in the Udaipur sample, 10% or less have a chair or a table
 - In the median country less than 15% have a bicycle and less than 10% own a television.
 - The middle classes acquire televisions!
 - In Udaipur very few possible business assets: Less than 1% own a tractor, a bullock cart, a motorized cycle, a fan
 - Very little savings we can detect (bank accounts, Self Help Groups etc.) (table 12, page 3)
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What the poor own

		Percent of Households with:			
		<u>Radio</u>	<u>Television</u>	<u>Bicycle</u>	<u>Land</u>
Living on less than \$1 a day					
Rural					
	Cote d'Ivoire	43.3%	14.3%	34.4%	62.7%
	Guatemala	58.5%	20.3%	23.1%	36.7%
	India - Udaipur	11.4%	0.0%	13.5%	98.9%
	Indonesia		26.5%		49.6%
	Mexico			41.3%	4.0%
	Nicaragua	59.3%	8.3%	11.1%	50.4%
	Pakistan	23.1%		27.0%	30.4%
	Panama	43.6%	3.3%	0.0%	85.1%
	Papua New Guinea	18.0%	0.0%	5.3%	
	Peru	73.3%	9.8%	9.8%	65.5%
	South Africa	72.2%	7.2%	20.0%	1.4%
	Tanzania		0.0%		92.3%
	Timor Leste	14.3%	0.6%	0.9%	95.2%

Percentage of household living in a household with a TV



Savings

	<u>% HH with a Savings Account</u>
Living on less than \$1 a day	
Rural	
Cote d'Ivoire	79.5%
India - Udaipur	6.4%
Indonesia	6.6%
Mexico	6.2%
Pakistan	11.7%
Panama	0.5%
Peru	0.5%
Timor Leste	13.4%

Living conditions

Health and health environment

- Housing conditions are dire
 - Electricity, sanitation, drinking water are still very rare in the poor's houses
 - This is something which changes very steeply with income: the middle class lives in much more comfortable conditions
 - Lots of illnesses (table 11)
 - Lots of visits, to private and public doctors
 - High expenditures on health, which increase steeply with income
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Basic infrastructure

		Percent of Households with:		
		In-House	Toilet/	
		Tap Water	Latrine	Electricity
Living on less than \$1 a day				
Rural				
	Cote d'Ivoire	11.8%	27.1%	45.1%
	Guatemala	37.7%	50.5%	29.9%
	India - Udaipur	0.0%	0.0%	8.3%
	Indonesia	5.6%	30.5%	96.9%
	Nicaragua	12.3%	59.0%	16.4%
	Pakistan	9.9%	28.5%	55.5%
	Papua New Guinea	1.7%	95.2%	2.0%
	Peru	29.7%		12.2%
	South Africa	4.4%	58.9%	5.6%
	Tanzania	0.7%	91.6%	1.1%
	Timor Leste	2.3%	31.3%	8.8%

Health in the household

	In Last Month			
	Percent of HH Members Sick	A Household's Average # of Consultations	Percent of Households that met At Least Once with a Consultant	
			Public	Private
Living on less than \$1 a day				
Rural				
Cote d'Ivoire	21.4%	1.28	49.7%	3.2%
India - Udaipur	46.1%	0.11	20.1%	58.1%
Indonesia	24.2%	0.77	20.7%	27.3%
Mexico	46.3%	1.11	47.7%	0.0%
Nicaragua	34.9%	0.15	46.0%	5.0%
Pakistan	28.0%	0.45	24.0%	48.8%
Panama	15.2%	0.10	23.8%	0.0%
Peru	11.1%	0.10	20.9%	8.5%
South Africa	12.5%	0.12	16.4%	6.9%
Tanzania	13.2%	0.07	23.2%	14.0%
Timor Leste	11.7%	0.21	30.2%	0.5%

How do the poor earn their
money?

Little bit of everything

- In most countries a majority of households get income from self-employment (even in rural areas self-employment is both in agriculture and outside it and many do both)
 - The next commonest occupation is wage work, including a lot of casual work. Many households do both.
 - 20% of the households in rural Udaipur say agriculture is their main source of earnings. 75% say their main earnings come from wage work. Yet almost all of them own land and cultivate it.
 - Another survey which identifies all the occupations the households are in (26 occupation, including sewing, gathering fuel) finds that each family has 3 working members and 7 occupations.
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Occupations: rural

	Percent of Households in which At Least One Member:				Percent of HHs That Receive Income From Multiple Sectors
	Is Self Employed In		Works for a Wage or Salary in		
	Agriculture	Other	Agriculture	Other	
Living on less than \$1 a day					
Rural					
Cote d'Ivoire	37.2%	25.9%	52.4%	78.3%	72.1%
Guatemala	64.4%	22.6%	31.4%	86.4%	83.8%
India - Udaipur	98.4%	5.9%	8.5%	90.7%	94.0%
Indonesia	49.8%	36.6%	31.1%	34.3%	50.4%
Mexico	4.9%	20.4%	2.8%	72.6%	13.2%
Nicaragua	54.7%	11.6%	0.3%	42.8%	18.4%
Pakistan	72.1%	35.5%	32.6%	50.8%	66.8%
Panama	69.1%	17.7%	0.0%	0.0%	19.2%
Peru	71.7%	25.2%			34.8%
South Africa	0.0%	9.1%	27.9%	26.6%	0.4%
Timor Leste	78.5%	12.0%			10.4%

Occupation: urban

	<u>Percent of Households in which At Least One Member:</u>				<u>Percent of HHs That Receive Income From Multiple Sectors</u>
	<u>Is Self Employed In</u>		<u>Works for a Wage or Salary in</u>		
	<u>Agriculture</u>	<u>Other</u>	<u>Agriculture</u>	<u>Other</u>	
Living on less than \$1 a day					
Urban					
Cote d'Ivoire	35.0%	4.8%	92.3%	26.3%	47.4%
India - Hyderabad	0.0%	18.0%	0.8%	89.8%	11.5%
Indonesia	9.6%	50.8%	35.6%	77.0%	56.9%
Mexico	27.3%	20.7%	24.3%	36.3%	24.2%
Nicaragua	24.9%	37.7%	0.0%	31.6%	8.3%
Pakistan	17.6%	51.2%	4.2%	67.2%	38.3%
Peru	6.2%	57.6%			21.9%
South Africa	0.0%	6.8%	9.0%	46.4%	0.0%
Timor Leste	80.6%	7.6%			2.1%

The businesses the poor run

- Families often run multiple businesses
 - Businesses are very small. Almost no outside labor
 - In Hyderabad only 20% of businesses have their own premises and the commonest businesses assets are pushcarts, scales and tables.
 - In Hyderabad the main businesses are tailoring, fruit/vegetable selling, general stores, telephone booths, selling milk, driving a small taxi: Skills?
 - Is there anything to worry about?
 - Some evidence of the wrong scale:
 - Innumerable side by side identical businesses
-

	Percent of HHs with at least One Non-Agricultural Business	In Each Business:			
		Average Number of Employees		Percent of Businesses that Own:	
		Paid Workers	Paid + Unpaid	Vehicles	Machines
Living on less than \$1 a day					
Rural					
Cote d'Ivoire	66.4%	0.14	2.48	2.6%	66.5%
Indonesia	29.4%	0.11	1.55	0.0%	
Mexico	7.8%	0.59	2.16	0.0%	
Nicaragua	14.0%	0.08	1.39	7.5%	0.0%
Pakistan	34.3%	0.13	1.16	36.7%	0.0%
Panama	15.2%	0.00	1.58	0.0%	
Papua New Guinea					
Peru	34.5%		1.50		
Urban					
Cote d'Ivoire	19.8%	0.03	2.43	0.7%	73.0%
India - Hyderabad	14.8%		1.85		0.0%
Indonesia	44.4%	0.15	1.49	0.0%	
Mexico	7.9%	0.75	2.30	0.0%	
Nicaragua	40.6%	0.03	1.18	0.0%	0.0%
Pakistan	51.7%	0.18	1.23	40.3%	0.0%
Peru	63.2%		1.39		

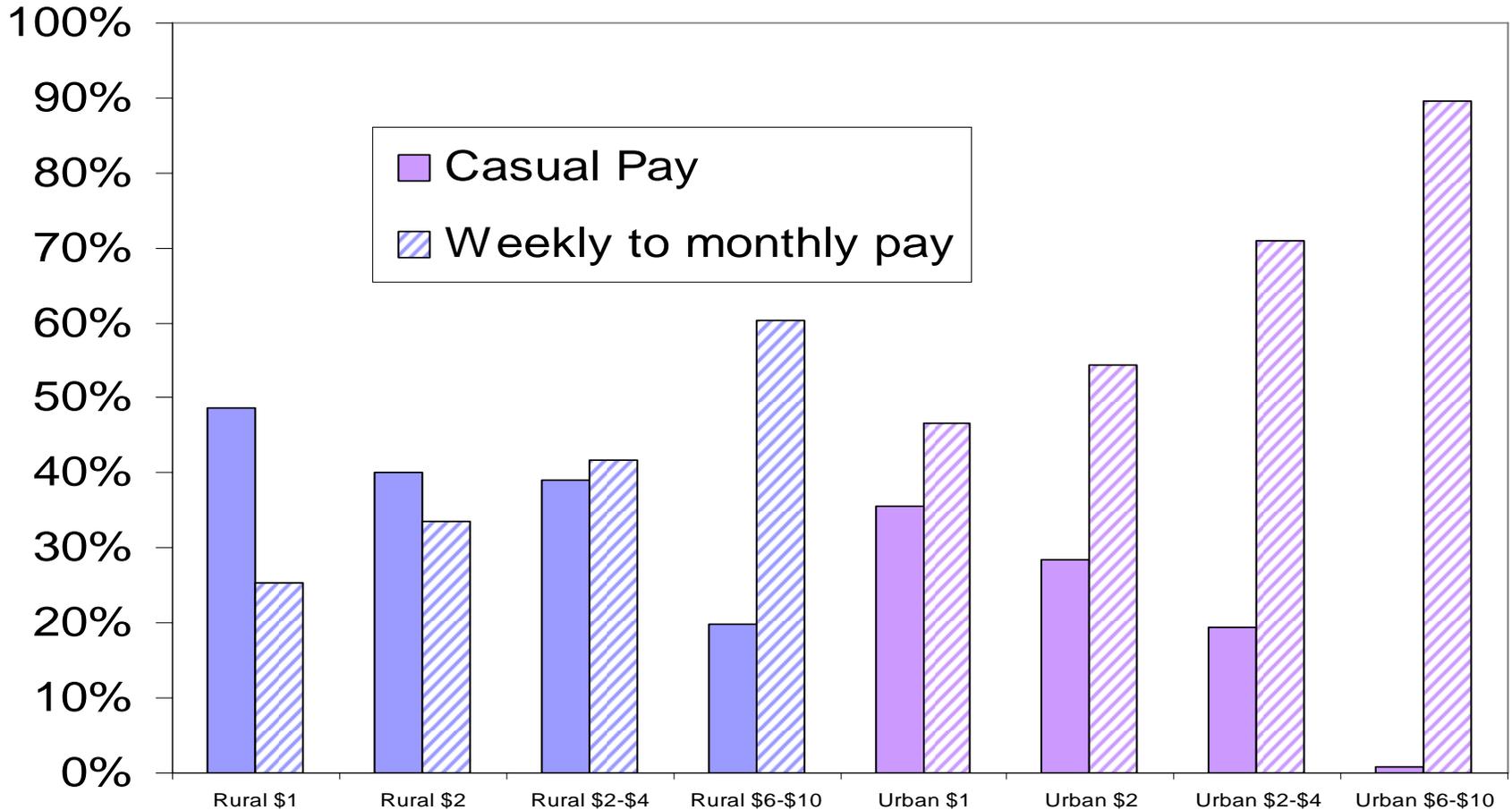
Is this different for the middle class?

- The “romantic” view of the penniless entrepreneurs is that if they get an opportunity, they will create successful ventures.
 - What happens to the businesses run by the middle class?
 - We find them to be very similar to that of the poor: similarly small, undercapitalized, under-specialized.
 - The fundamental difference between the middle class and the poor is that the middle class have steady jobs (regular salaried job that pay a monthly salary).
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The scale of businesses

	<i>in each business:</i>			
	<i>Average number of employees</i>			
	<i>paid + unpaid</i>			
	<i>\$1</i>	<i>\$2</i>	<i>\$2-\$4</i>	<i>\$6-\$10</i>
<u>Urban</u>				
India Hyderabad	1.6	1.7	2.4	
Indonesia	1.4	1.6	1.8	2.8
Ivory Coast		2.6	2.6	2.9
Mexico	2.1	2.2	2.6	2.5
Nicaragua	1.5	1.6	1.8	
Pakistan	1.2	1.3	1.7	
Panama			1.6	1.7
Peru		1.4	1.6	2.0

Percentage of employees on casual or regular payments



Migration

- In most countries in our sample long-term migration for work is rare
 - Temporary migration on the other hand seems quite common. In 60% of the very poor households in Udaipur someone had migrated for work.
 - Average duration of a completed episode is 40 days.
 - Total time spent away in a year on average is 18 weeks.
 - Yet for many of them it provides the majority of their income.
-

Percent of Adults who Have Migrated

Since Birth

For Work

Rural

Cote d'Ivoire	26.9%	11.1%
Guatemala		
Indonesia	34.3%	30.8%
Mexico	48.7%	45.6%
Nicaragua	22.4%	5.6%
Pakistan	16.7%	3.7%
Panama	34.8%	0.6%
Papua New Guinea	4.8%	
Peru	15.3%	6.7%
Timor Leste	61.6%	

Migration to urban areas

Urban	Percent of Adults who Have Migrated	
	<u>Since Birth</u>	<u>For Work</u>
Cote d'Ivoire	14.1%	6.0%
Indonesia	43.0%	41.3%
Mexico	37.4%	32.3%
Nicaragua	16.2%	5.9%
Pakistan	23.1%	3.6%
Papua New Guinea	18.9%	
Peru	16.5%	9.6%
Timor Leste	62.6%	

The economic environment of the poor

The market for credit

1. Few Loans
 2. From where?
 3. High interest rates (3% a month in Hyderabad)
 4. Low default rate
-

Savings and Insurance

- We already discussed the low savings
 - Part of the problem is low access to savings opportunities
 - Savings options:
 - Banks
 - SHG
 - Roscas
 - Insurance: almost no formal insurance (health, life, weather). All the insurance will have to be informal
-

Infrastructure and public policy

- We have already seen that availability of electricity, tap water, etc is much lower for the poor
 - Huge variation across countries: point out some of the key differences?
 - Governments are typically providing schools and health center, yet, even the poor spend money on health and education: de facto privatization in some places.
 - Poor spend fair amount of money on health and education, for very poor quality private sector.
 - Why does that happen?
-

Five things that stand out

1. Why are they not more specialized?
 2. Why are so many of them are entrepreneurs?
 3. Why don't they eat more?
 4. Why don't they accumulate more wealth?
 5. Why don't they migrate for longer
-

Lack of specialization

- Indivisibilities in the labor market: you can only sell breakfast in the morning; You can only farm when there is rain, etc.
 - Other things you do are also not divisible, or the indivisible occupations have excess returns.
 - Neither seems to fit the facts.
 - Lack of markets/access to the market
 - Risk diversification: the poor have almost no access to formal insurance and informal insurance has its limits
 - Lack of capital: you do not have the money to expand the business that you are best qualified to do: Lot of evidence on credit constraints
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The many entrepreneurs

- Entrepreneurship is what you often do when you cannot find a job.
 - You cannot find a job because all the other entrepreneurs are small-scale and use only family labor.
 - This is in part a result of financial constraints which mean that people either cannot or will not want to invest more
 - And in part probably a result of labor market and other regulations.
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Why not eat more?

- Keeping up with the neighbors
 - Not having what the others have may be a source of unhappiness.
 - But people are not buying durables. They are spending on tea, sugar, alcohol, what they call “avoidable expenses”
 - There are many others things to buy
 - And the health effects are negligible
 - Deaton-Dreze explanation of food consumption drop in India is decline in need for calories
 - Or the health effects are serious but people cannot resist “temptations”.
-

Why not save more?

- The poor have very limited access to conventional savings opportunities (Banks, Post Offices, etc.): less than 14% of households have any kind of Bank account (except in Cote D'Ivoire)
 - Saving at home is hard: it could be stolen, there is inflation risk etc.
 - But alternatively, why not put it in productive assets: after all, an implication of the high interest rates that the poor pay is that the return on capital must be very high.
 - We calculate that a middle class business owner in Hyderabad could double their working capital stock in one year by spending 5% of their budget on health (like the poor) rather than 10%.
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Understanding Low Savings

- Other example: Fruit sellers, borrow at 5% A DAY. How much is that a year?
 - What is the returns on saving one cup of tea a year?
 - How to explain the low savings then?
 - Is it because of very high discount rates?
 - Is it because those discount rates are inconsistent over time?
 - Is it for some other reason??
-

Why not migrate more?

- The popular discourse is usually that there is too much migration to the cities, but there seems to be too little
 - There is also a lot of back and forth that prevent people to settle into a good job in the city
 - Loss of insurance network
 - Loss of utility (urban housing conditions can be worst than rural).
-