

**Example of Worksheet Tool**  
**Developed for Index Insurance Program in Malawi, 2006**

This worksheet was used in farmer workshops to explain the details of the insurance program developed by the World Bank, IRI, the National Smallholder Farmers' Association of Malawi (NASFAM), and local banks and insurers to allow smallholder farmers access to loans for groundnut inputs. The insurance is designed to repay part or all of these loans in the case of poor rainfall, as measured at the nearby meteorological station. In Excel, the worksheet can be modified for new contract details and price changes, and to dynamically show the effects of these changes on the farmers' costs and coverage. The worksheet has been used in expansions of the program to Kenya, Tanzania, and Nicaragua.

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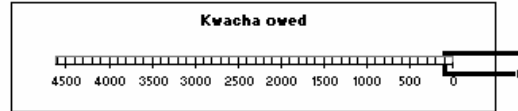
Project Funding: CRED (NSF), IRI, and the World Bank.

# Malawi Index Insurance Worksheet

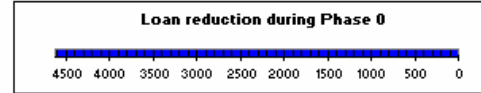
**2006-2007 Potential Groundnut Contract -- LILONGWE**  
**Loan approximation worksheet**      Rainfall is measured at Lilongwe Airport weather station.      Rainfall amounts may differ from those received at individual fields.

**TOTAL LOAN** 4619.85

	Upper trigger	Lower trigger
Phase 1	40 mm	30 mm
Phase 2	40 mm	30 mm
Phase 3	230 mm	20 mm



**Phase 0:**  
 If there is less than or equal to 25mm of rain in each and every one of the following 10-day periods, the loan is reduced to zero: 11th-20th November; 21st-30th November; 1st-10th December; 11th-20th December; 21st-31st December; 1st-10th January; 11th-20th January



**To use this sheet:**

- For Phase 1, read the amount of rainfall received and find where it hits the line.
- Using a piece of paper, measure the distance from the left side of the graph to the line.
- Mark that distance against the small graph at the top, starting at the left side.
- Repeat for the other phases, but in Step 3, start at the previous mark.

5. Note that rainfall is measured in 10 day periods, and capped at 60mm per period.  
**Most years, farmers will not receive a loan reduction. Farmers will not receive more than the maximum payout.**

