Explanations to data sets

Contracts_Red.txt contains the data connected with all transitions to new states. The transitions in one experimental group in one treatment follow on one another, starting with state 0 and ending with a state where the censored duration of the state is >0.

Note that this data set has been used also for other investigations and is therefore not "minimized". The data which are used in the paper are in red. The list of variables is

[1]   number of transition 1:5799

[2]   experimental session

[3]   allocation

[4]   period = position in the series of 6 or seven experiments with a different order of treatments

[5]   offer =

[6]   group in an experimental session: 1 or 2 (sessions always with eight subjects)

[7]   offerer 1=worker 1, 2=worker 2, 3=firm 1, 4=firm 2

[8]   offer to

[9]   current state

[10]   setting 1=info, 2= no info, 3= belief elicitation

[11]   fixw   (necessary for other treatments which are not used here)

[12]   fixf   (necessary for other treatments which are not used here)

[13]   treatment (see paper)

[14]   Tsend

[15]   Taccept

[16]   alpha = productivity of worker 1 and firm 1 (see paper)

[17]   beta

[18]   gamma

[19]   delta

[20]   time uncensored = transition time from previous state

[21]   rest time until deadline

[22]   time censored   if > 0 then there are no further transitions

[23]   action

[24]   new state

[25]   old state

[26]   transition from to

Zielstates.txt contains the list of states to which transitions are possible from an initial state

Explanation to programs

In our data set, all transition times x are rounded to integer values (seconds). Therefore we substitute the density f(x) by the difference of distribution function values F(x+0.5)-F(x-0.5).

The following programs estimate the parameters of distributions (of transition times) and the loglikelihood scores in Table 3.

- **Expo.R** for the exponential distribution
- **SumExpoPar2.R** for the sum of two exponential distributions
- **Weibull2Par.R** for the Weibull distribution
- **Gamma.R** for the gamma distribution
- **LogNorm.R** for the lognormal distribution (winner of the competition)

The following programs are used to estimate "regression coefficients" for the parameters of the lognormal distribution.

- **LogNRestTiPerES1.R** estimates the parameters of lognormal distributions for every transition as determined by linear equations with "RestTime", "Period"= number in the random order of treatments, and "Equal Split"= absolute difference to equal split of productivity. Results are in Table C in the online appendix; stylized results are in Table 6 in the paper. By inactivating influences, the progam can be used to estimate regressions with fewer variables (not explicitly reported in the paper).

- **LogNRestTiCoreES.R** estimates the same as **LogNRestTiPerES1.R,** but Per is substituted by a dummy with 1 for "allocation was a core allocation". Only for source states 5 and 6 (n= 6 and 7) because core allocations have to be complete matches.

Further explanations are included as comments in the progams. In particular in **LogNRestTiPerES1.R** you find also alternatives for the numerical optimization procedures.