

IITJ (2013-14), 3rd Year, II Sem.  
32002-Artificial Intelligence, Quiz#2

March 5, 2014

Duration: 20 Minutes

Roll No.....  
(Max Marks: 14)

1. Write the following in  $\mathcal{DL}$  syntax. (8)
  - (a) A bank has customers.
  - (b) Customers can be persons (retail customers) or companies (business customers).
  - (c) A retail customer cannot be a business customer, a business customer can never be a retail customer.
  - (d) Rajan is a retail customer, Santa Inc. is a business customer.
  - (e) A customer can have a bank account, a bank account belongs to a specific bank.
  - (f) A customer has to have at least one bank account.
  - (g) Only trusted customers can get a credit.
  - (h) A retail customer is a trusted customer if he has a trusted account, a business customer is always a trusted customer
2. With three cube blocks  $A, B, C$ , each available on a table, write situational calculus statements, to create a stack of  $A, B, C$ , with the  $A$  block at top. Assume that this job is performed by a robot arm, which is initially empty. (6)