

CH548: Electro Mechano Organic Chemistry (Quiz 1) (Max Marks 10)

Name:

Roll No:

State True (T) or False (F). (+0.5 for correct and -0.25 for wrong selection)	T/F
Improving the rate of the reaction is central to Process Intensification	T
The factor “A” in Arrhenius equation does not change with concentration	F
Activation energy does not change with temperature	T
Rate of the reaction does not depend upon the concentration of reagents	F
Rate of heat exchange is dictated by the reaction	F
Time in batch reactor is equivalent to length in flow reactor while keeping the volume same	T
It is possible to monitor events which are shorter than the time scale of observation in a batch reactor	F
It is easier to do solution phase chemistry above the normal boiling points of the solvents in flow reactors	T
Flow technology provides us a new reaction space as compared to batch technology	T
It is easier to do gas-liquid reactions in batch as compared to flow due to the presence of stirrer in batch reactors	F
Secondary nucleation is difficult to avoid in a flow reactor	F
Diffusion time is directly proportional to the square root of the dimension of the container	F
Rate of the reaction has to be few orders slower than rate of mixing	T
Higher is the heat-exchange ability of the reactor, higher is the throughput for a process	T
Increase in concentration does not change the fraction of molecules with required activation energy	T
Qualitatively, every 20 degrees rise in temperature increases the rate of reaction by four times	T
Solution phase chemistry is possible only below critical temperature of the solvent	T
It is possible to get major product from the kinetically stable intermediate in a batch reactor	F
Intramolecular reactions dominate over intermolecular reaction in a batch reactor and is independent of the reactivity of the species	T
FUMI stands for “Fundamental Uniform Molecular Interdiffusion”	F