



OLIMPIADA NAȚIONALĂ DE CHIMIE

Bacău, 17-22 aprilie 2016
Ediția a L-a

Barem de evaluare și de notare Proba teoretică Clasa a XI-a

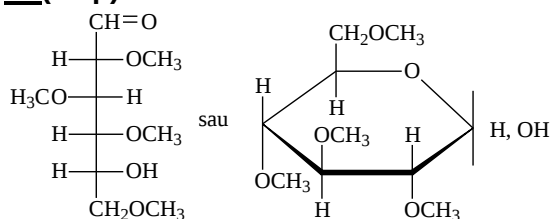
Se punctează orice modalitate de rezolvare corectă a cerințelor.

Subiectul I (20 puncte)

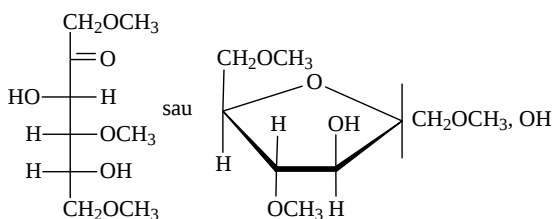
1 E; 2 B; 3 D; 4 C; 5 A; 6 C; 7 A; 8 B; 9 C; 10 C.
Fiecare raspuns corect primește 2 puncte

Subiectul al II-lea (25 puncte)

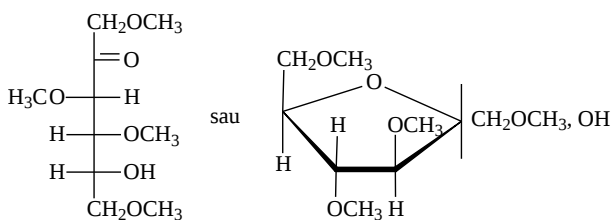
A. (10 p)



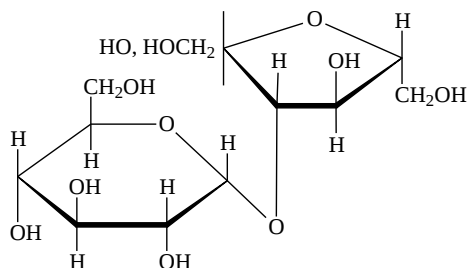
(D) 2,3,4,6-tetra-O-metil-D-glucoză **1p**



(E) 1,4,6-tri-O-metil-D-fructoză **1p**

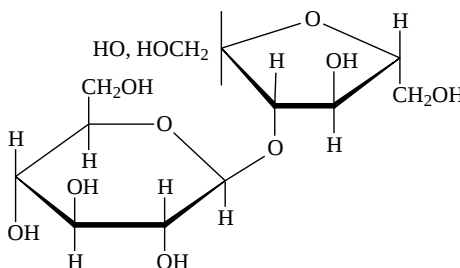


(F) 1,3,4,6-tetra-O-metil-D-fructoză **1p**

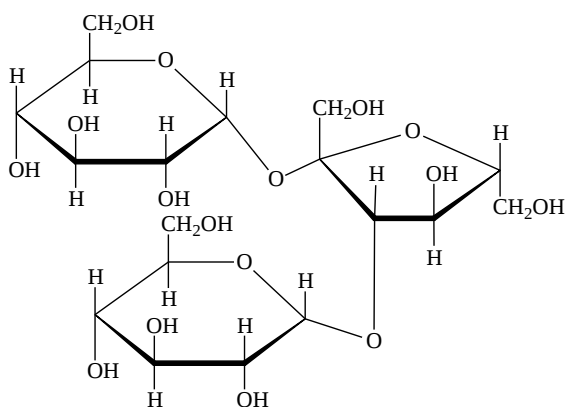


2p

(C) Turanoză



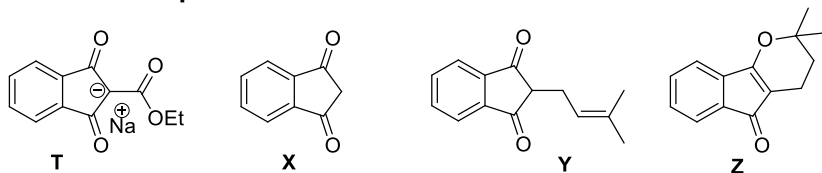
2p



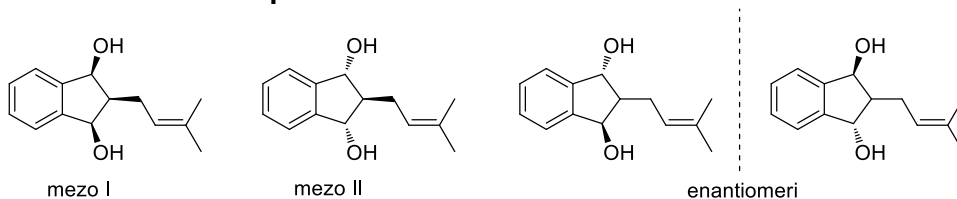
(A) melezitoză - 3p

B.

4 structuri x 3p



4 stereoizomeri = 3p

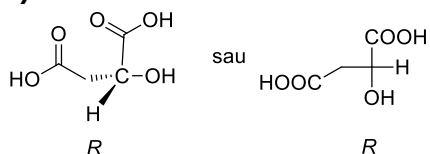


Subiectul al III-lea

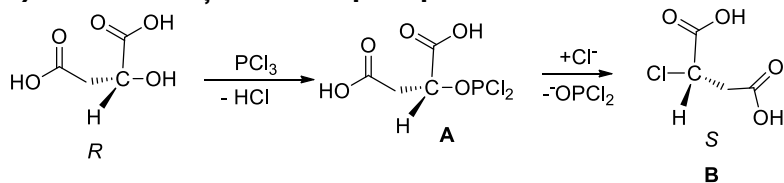
(25 puncte)

A. (10p)

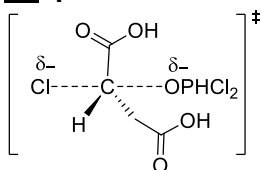
a) structura corectă tridimensională sau Fischer = 2p

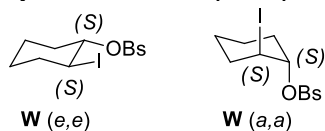
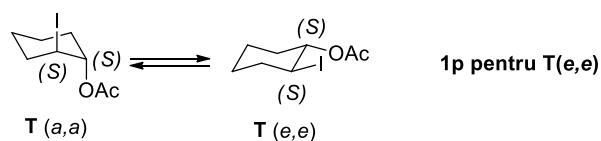
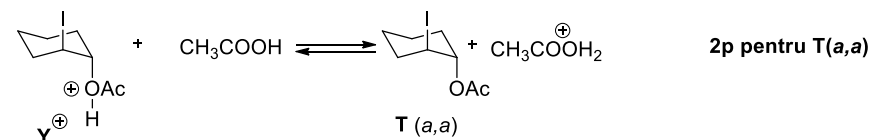
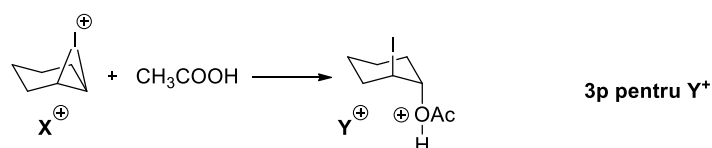
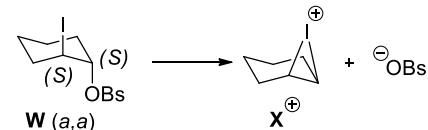
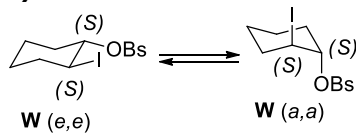
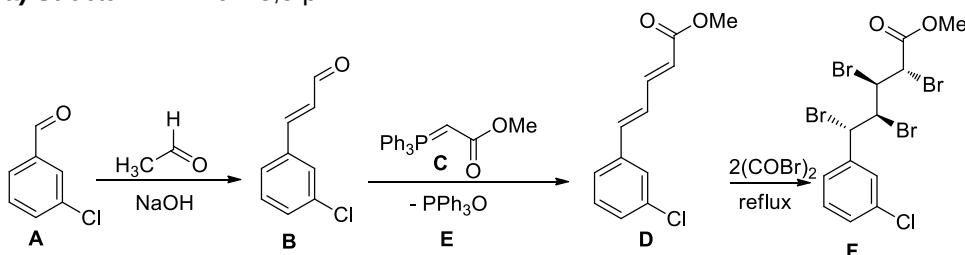


b) Structuri A și B = 2 x 3p = 6p



c) 2p



B. 15 p**a) 2 structuri x 2p = 4p****b)****c) 2p pentru configurațiile S,S - retenție de configurație****Subiectul al IV-lea****(30 puncte)****a) Structuri A-F = 6 x 3,5 p**Structura X = $[\text{BrP}^+\text{Ph}_3]\text{Br}^-$ = 3p**b) 16 stereoizomeri - 8 perechi de enantiomeri - 2p****c) produs de adiție Diels Alder 4p**