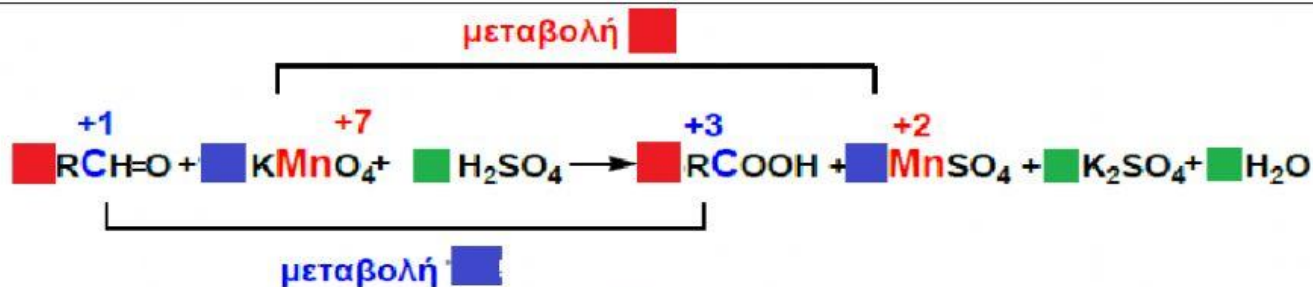


ΦΥΛΛΟ ΕΡΓΑΣΙΑΣ ΣΤΗΝ ΟΞΕΙΔΩΣΗ ΑΛΔΕΥΔΩΝ-ΟΞΕΩΝ

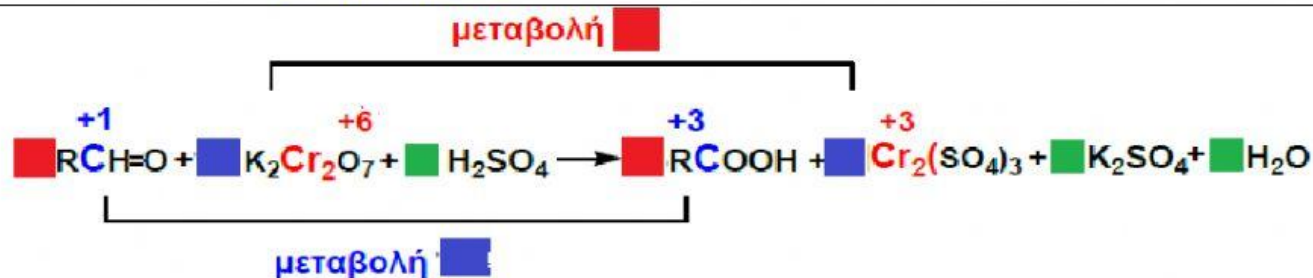
ΟΝΟΜΑ

ΕΠΙΘΕΤΟ

1.



2.



Αντιδραστήριο Tollens

$\text{AgNO}_3 / \text{NH}_3$

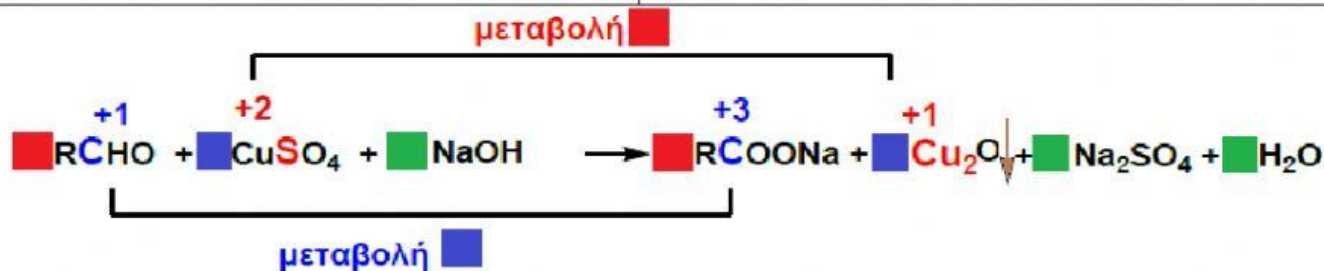
ΚΑΤΟΠΤΡΟ
ΑΡΓΥΡΟΥ

Φελίγγειο υγρό:

$\text{Cu}_2\text{SO}_4 / \text{NaOH}$

ΙΖΗΜΑ $\text{Cu}_2\text{O} \downarrow$

3.



4.	μεταβολή ■ $\begin{array}{ccccccc} & +1 & & +2 & & +3 & +1 \\ \blacksquare & \text{CH}_3\text{CHO} & + & \blacksquare \text{CuSO}_4 & + & \blacksquare \text{NaOH} & \longrightarrow & \blacksquare \text{CH}_3\text{COONa} & + & \blacksquare \text{Cu}_2\text{O} & + & \blacksquare \text{Na}_2\text{SO}_4 & + & \blacksquare \text{H}_2\text{O} \end{array}$ μεταβολή ■
5.	μεταβολή ■ $\begin{array}{ccccccc} & +1 & & +1 & & +3 & 0 \\ \blacksquare & \text{RCHO} & + & \blacksquare \text{AgNO}_3 & + & \blacksquare \text{NH}_3 & + & \blacksquare \text{H}_2\text{O} & \longrightarrow & \blacksquare \text{RCOONH}_4 & + & \blacksquare \text{Ag} & + & \blacksquare \text{NH}_4\text{NO}_3 \end{array}$ μεταβολή ■
6.	μεταβολή ■ $\begin{array}{ccccccc} & +1 & & +1 & & +3 & 0 \\ \blacksquare & \text{CH}_3\text{CHO} & + & \blacksquare \text{AgNO}_3 & + & \blacksquare \text{NH}_3 & + & \blacksquare \text{H}_2\text{O} & \longrightarrow & \blacksquare \text{CH}_3\text{COONH}_4 & + & \blacksquare \text{Ag} & + & \blacksquare \text{NH}_4\text{NO}_3 \end{array}$ μεταβολή ■
7.	μεταβολή ■ $\begin{array}{ccccccc} & +2 & & +7 & & +4 & +2 \\ \blacksquare & \text{HCOONa} & + & \blacksquare \text{KMnO}_4 & + & \blacksquare \text{H}_2\text{SO}_4 & \longrightarrow & \blacksquare \text{CO}_2 & + & \blacksquare \text{MnSO}_4 & + & \blacksquare \text{K}_2\text{SO}_4 & + & \blacksquare \text{Na}_2\text{SO}_4 & + & \blacksquare \text{H}_2\text{O} \end{array}$ μεταβολή ■
8.	μεταβολή ■ $\begin{array}{ccccccc} & +3 & & +7 & & +4 & +2 \\ \blacksquare & \begin{array}{c} \text{COOH} \\ \\ \text{COOH} \end{array} & + & \blacksquare \text{KMnO}_4 & + & \blacksquare \text{H}_2\text{SO}_4 & \longrightarrow & \blacksquare \text{CO}_2 & + & \blacksquare \text{MnSO}_4 & + & \blacksquare \text{K}_2\text{SO}_4 & + & \blacksquare \text{H}_2\text{O} \end{array}$ μεταβολή ■
9.	μεταβολή ■ $\begin{array}{ccccccc} & +3 & & +6 & & +4 & +3 \\ \blacksquare & \begin{array}{c} \text{COOH} \\ \\ \text{COOH} \end{array} & + & \blacksquare \text{K}_2\text{CrO}_4 & + & \blacksquare \text{H}_2\text{SO}_4 & \longrightarrow & \blacksquare \text{CO}_2 & + & \blacksquare (\text{Cr})_2(\text{SO}_4)_3 & + & \blacksquare \text{K}_2\text{SO}_4 & + & \blacksquare \text{H}_2\text{O} \end{array}$ μεταβολή ■

10

