

29. Let p and q be any two logical statements and $r : p \rightarrow (\sim p \vee q)$. If r has a truth value F , then the truth values of p and q are respectively :

[Main Online April 25, 2013]

- (a) F, F
- (b) T, T
- (c) T, F
- (d) F, T

29. (c) $p \rightarrow (\sim p \vee q)$ has truth value F.

It means $p \rightarrow (\sim p \vee q)$ is false.

It means p is true and $\sim p \vee q$ is false.

$\Rightarrow p$ is true and both $\sim p$ and q are false.

$\Rightarrow p$ is true and q is false.