

Quick Hit 4

1. Is the following argument valid or invalid? Make sure to show your work.

- 1.  $p \rightarrow q$
- 2.  $(\sim q) \vee (\sim p)$
- $\therefore \sim p$

Goal:  $(\textcircled{1} \wedge \textcircled{2}) \rightarrow \therefore$

$p$	$q$	$\textcircled{1}$ $p \rightarrow q$	$\sim q$	$\therefore$ $\sim p$	$\textcircled{2}$ $\sim q \vee \sim p$	$\textcircled{1} \wedge \textcircled{2}$	$(\textcircled{1} \wedge \textcircled{2}) \rightarrow \therefore$
T	T	T	F	F	F	F	T
T	F	F	T	F	T	F	T
F	T	T	F	T	T	T	T
F	F	T	T	T	T	T	T

The argument is valid