

keyword



cough

cough model

capsaicin

dihydrocodeine

antitussive

respiration

respiratory system



Official website

Capsaicin-induced cough model

We will introduce a cough model using capsaicin as an inducer, one of our respiratory disease model tests. Please feel free to contact us with any questions or concerns you may have.

Schedule and Method

Animals used: Guinea pigs

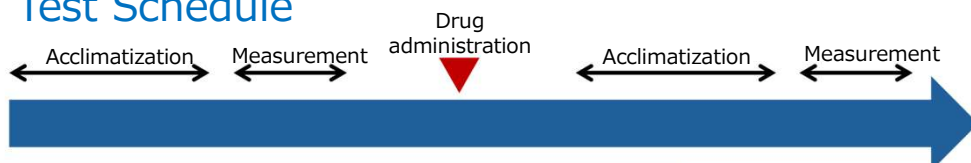
Inducer: Capsaicin

Positive control substance: Dihydrocodeine phosphate

Induction method: Capsaicin solution is vaporized with a nebulizer, pushed out with a ventilator, and given by inhalation.

Method: Before administering the drug, capsaicin is given by inhalation, and the number of coughs is measured. Capsaicin is given again 1 hour after administering the drug, and the number of coughs is measured.

Test Schedule

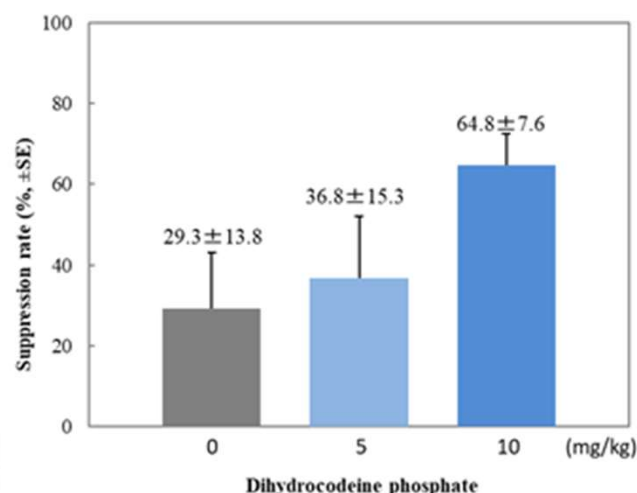


Evaluation and Results

Evaluation item: Number of coughs

Evaluation method: The suppression rate (%) is calculated from the number of coughs before drug administration (Pre) and after drug administration (Post).

$$\text{Suppression rate (\%)} = (\text{Pre}) - (\text{Post}) / (\text{Pre}) \times 100$$



Cough suppression rate

Results

Cough suppression rate increased after administration of dihydrocodeine phosphate.

