

Aim :→

To introduce the laboratory technique of Aspirin from salicylic acid.

Reference :→

Dr. Jain K.S., "Dr. Minipor P.B., "A Practical Book of Pharmaceutical organic chemistry".
Nirali Publication, Page no-

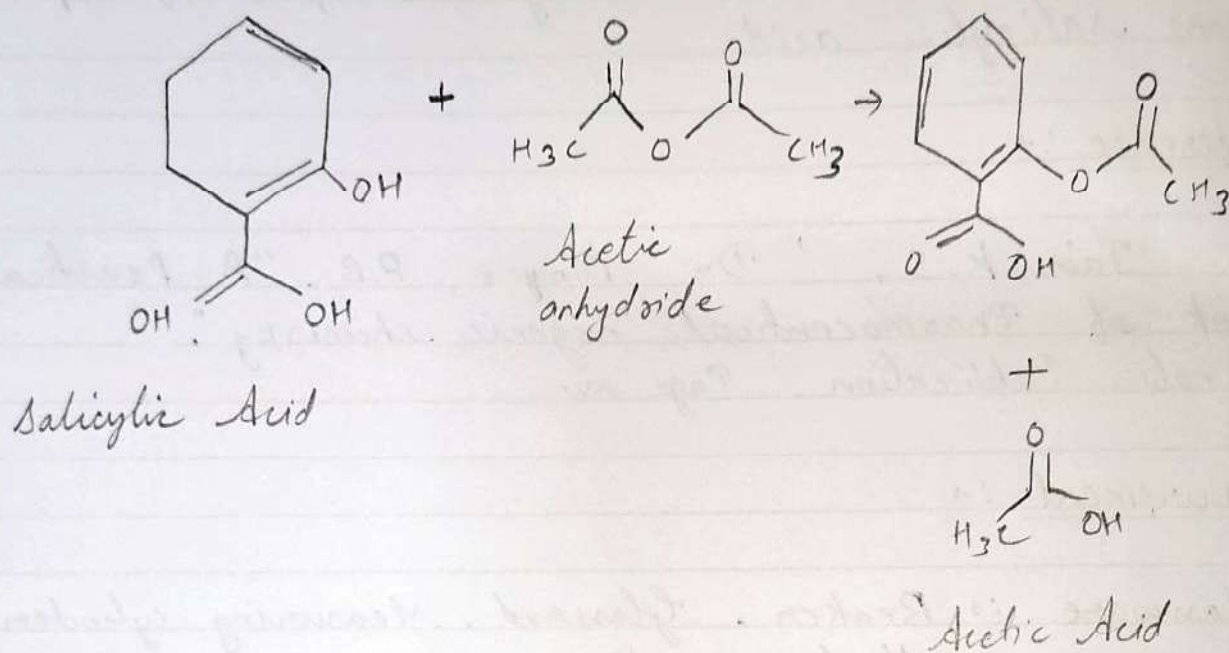
Requirement :→

- (a) Glassware :→ Beaker, Glassrod, Measuring cylinder, Heating Mantle.
- (b) Chemical :→ Aspirin, Salicylic Acid water.

Theory :→

Aspirin → It is also known as acetylsalicylic acid. It is used in medication to reduce pain, fever and inflammation. It is given shortly after a heart attack to decrease the risk of death. It is also used long term to help prevent further heart attacks and blood clot in people, high risk, for pain and fever. Effect typically begins within 30 min. It also suppresses the normal functioning of platelets.

Structure of Aspirin



Aspirin (2-Acetoxy benzoic Acid)

Aspirin can also help treat pain and swelling associated with the following chronic health condition.

- Rheumatic condition including rheumatoid arthritis, osteoarthritis with the following chronic health condition. and other inflammatory joint condition.
- Systemic lupus erythematosus.
- Inflammation around the heart known as Pericarditis.

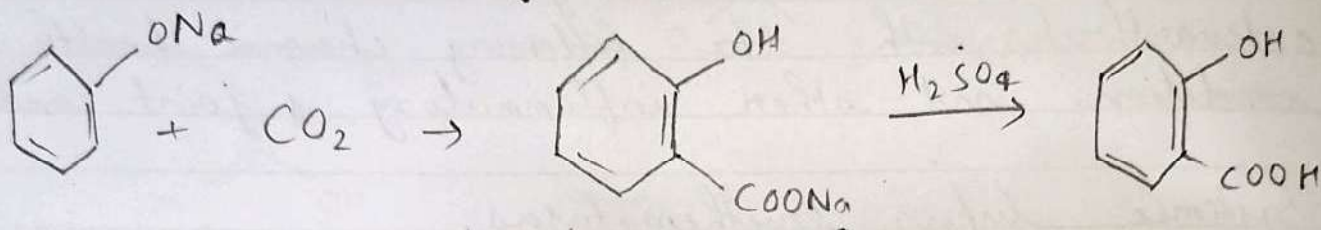
Precaution

- Bleeding disorder, such as hemophilia.
- Uncontrolled high blood pressure.
- Asthma.
- Peptic or stomach ulcers.
- Liver or kidney disease.

Salicylic Acid :-

It is an organic compound and it is used to treat mild to moderate acne. It may be used in combination with other acne treatment.

Structure of Salicylic Acid.



Sodium
Phenoxide
(Sodium Phenolate)

Sodium
Salicylate

Salicylic
Acid.

When it is called to the skin. Salicylic acid belong to a class of drug known as salicylates. When applied to the skin salicylic acid may work by helping the skin to shed dead cells from the top layer and by decreasing redness. This also decrease the number of pimples that form speed healing. Salicylic acid toxicity but it can occur from topical application of salicylic acid. to reduce

To reduce that risk follow these :-

- Do not apply salicylic acid ~~is consider safe overall it~~. and product to large areas of your body.
- Do not use for long period of time.
- Do not use under air - tight dressing. Such as plastic wrap.

Side effects :-

Although salicylic acid is consider safe overall it may cause skin irritation. ~~when~~, dryness. Some other side effect are :- skin tingling or stinging, itching, etc.