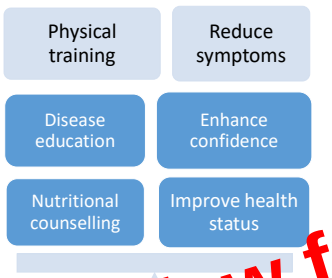
- This may reflect improvement in lung emptying that reduce dynamic hyperinflation and ease the work of breathing.
- Oral bronchodilator therapy may be used in patients who cannot use inhaled devices efficiently
  - Theophylline or bambuterol (pro drug of terbutaline) {Their use is limited by side effects, unpredictable metabolism and drug interactions}

## 3. Corticosteroids

- Inhaled corticosteroids (ICS) reduce the frequency and severity of exacerbations.
- The usual prescription is a fixed dose combination of inhaled corticosteroids (ICS) and a long acting β2 agonist (LABA)
- Oral corticosteroids are useful only during exacerbations
- Maintenance therapy my contribute to osteoporosis and impaired skeletal muscle function and should be avoided

## 4. Pulmonary rehabilitation

- Encourage exercises – reassure patients that breathlessness whilst distressing is not dangerous




## 5. Oxygen therapy

- Long term domiciliary oxygen therapy (LTOT) has been shown to be of significant benefit in selected patients
- Can conveniently be provided by an oxygen concentrator for a minimum of 15 hours per day (the aim is to increase the $PaO_2$ to at least 8k Pa (60mmHg).)



## 6. Surgical interventions

- Resection of large bullae (bullectomy)
- Lung volume reduction surgery (LVRS)
- Both bullectomy and LVRS can be performed thoracospically minimising morbidity

## 7. Other measures

- Annual influenza and pneumococcal vaccination
- Obesity management
- Address – poor nutrition
  - depression
  - social isolation
- Palliative management