PACE

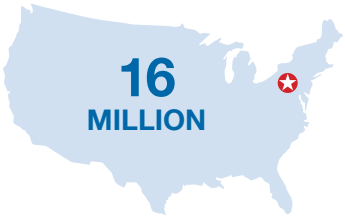
Pharmaceutical Assistance Contract for the Elderly

Alosa Health

Balanced information for better care

Helping patients with COPD breathe easier

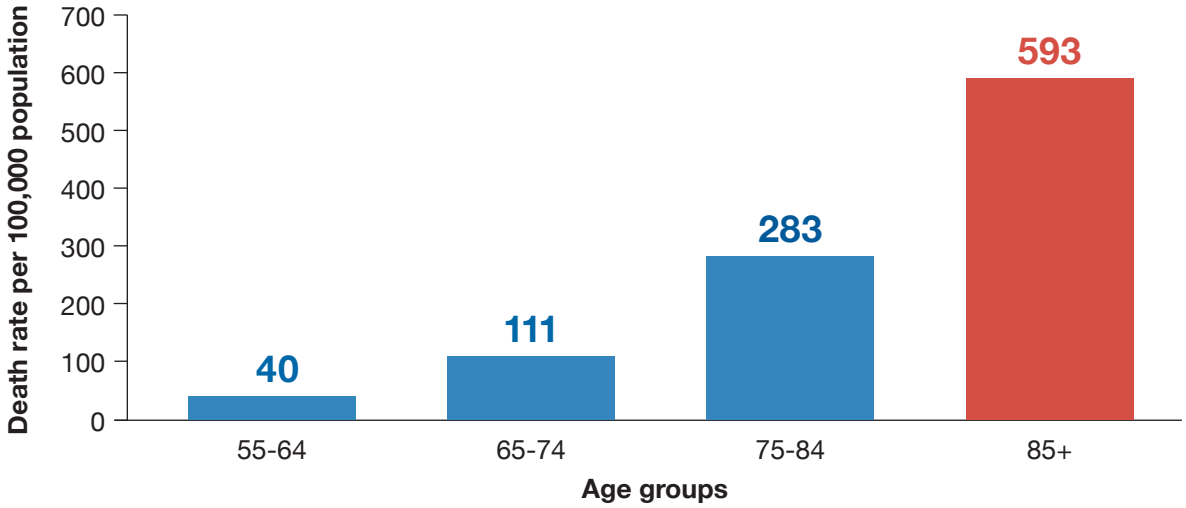
Opportunities to improve COPD care



More than **16 million Americans** have been diagnosed with COPD.[1]

A higher percentage of Pennsylvanians smoke cigarettes (15%) than the national average (12%).[2]

FIGURE 1. Older adults have the highest rates of COPD mortality.[2]



Despite this burden, many patients with COPD remain undiagnosed.

FIGURE 2. Getting the COPD diagnosis right[3]

Roadmap for COPD care

Strategies for each element are presented in more detail below.

Recommend smoking cessation to prevent COPD.

While cessation is ideal, **reducing use** can also be beneficial and eventually lead to quiting.

Prescribe medications for symptom and exacerbation relief.

Maintenance inhaled therapy	Rescue inhaled therapies	Therapies for severe disease
LABA: Long-acting beta agonists **LAMA:** Long-acting muscarinic antagonists **ICS:** Inhaled corticosteroids	**SABA:** Short-acting beta agonists (e.g., albuterol) **SAMA:** Short-acting muscarinic antagonist (e.g., ipratropium)	azithromycin roflumilast (Daliresp) dupilumab (Dupixent) ensifentrine (Ohtuvayre) oxygen supplementation

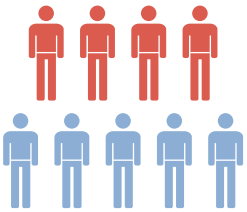
Recommend non-pharmacologic care to help prevent exacerbations.

Immunizations

Pulmonary rehabilitation

Inhaler technique training

Smoking cessation prevents or alleviates COPD



4 out of 9 patients who smoke and saw their clinician in the past year did not receive advice about quitting.[4]

- Talking to a healthcare professional is more effective than trying to quit alone.[5]
- Even conversations shorter than 5 minutes increase quit rates.[5]
- **Continue to revisit smoking cessation at every visit.**

Prescribe medications that can help patients stop smoking.

TABLE 1. Useful tools for smoking cessation

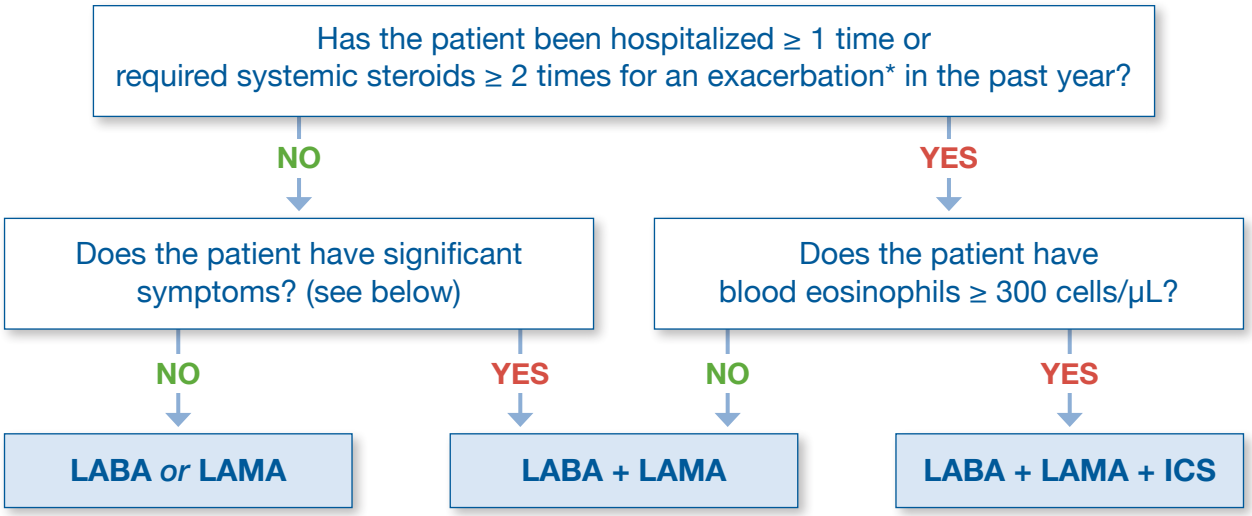
	Bupropion (Wellbutrin, Zyban, generics)	Varenicline (Chantix)	Nicotine replacement therapy (NRT)
How provided	prescription only	prescription only	over-the-counter gum, patch, lozenge; prescription nasal spray
When to start	at least 1 week prior to planned quit date	at least 1 week prior to planned quit date, or day starting reduced use ***or*** expressed intent to quit, without date set	when cutting back or stopping tobacco product
Possible side effects	insomnia, agitation, dry mouth, headache	nausea, insomnia, vivid dreams, headache	irritation at delivery site (patch)
Notes	contraindicated in patients with seizure disorder	can be used in patients with psychiatric disorders[6] slightly more effective than other pharmacologic cessation options	can be used alone or with prescription options recommend using a long-acting NRT (i.e., patch) with a short-acting one (i.e., gum)

The role of electronic cigarettes (vaping) in smoking cessation

- Patients using electronic or e-cigarettes may be twice as likely to stop smoking.[7]
- The long-term effects of vaping or smoking e-cigarettes are unknown.[8] While total cessation should be the primary goal, FDA-authorized e-cigarette products are likely less harmful than combusted tobacco products like cigarettes.
- If an electronic cigarette is to be used, an FDA-authorized version is recommended: **qrco.de/FDA_ecigs**

Select COPD treatment based on clinical factors

FIGURE 3. Algorithm for choosing initial COPD medications in symptomatic patients, based on the burden of daily symptoms and exacerbations; adapted from the 2025 GOLD guidelines[3]



Use one of two standardized tools to assess symptom severity:

Modified Medical Research Council (mMRC) dyspnea score
Or ask: *"Do you walk slower than people of the same age because of breathlessness, or have to stop for breath on LEVEL ground?"*

COPD Assessment test (CAT)
Assesses overall health, not just dyspnea

Significant symptoms are an mMRC ≥ 2 or a CAT score ≥ 10.

*Establish exacerbation history: Exacerbations are discrete episodes of worsening symptoms (i.e., increased dyspnea, sputum volume, or purulence) over < 14 days that require intervention.

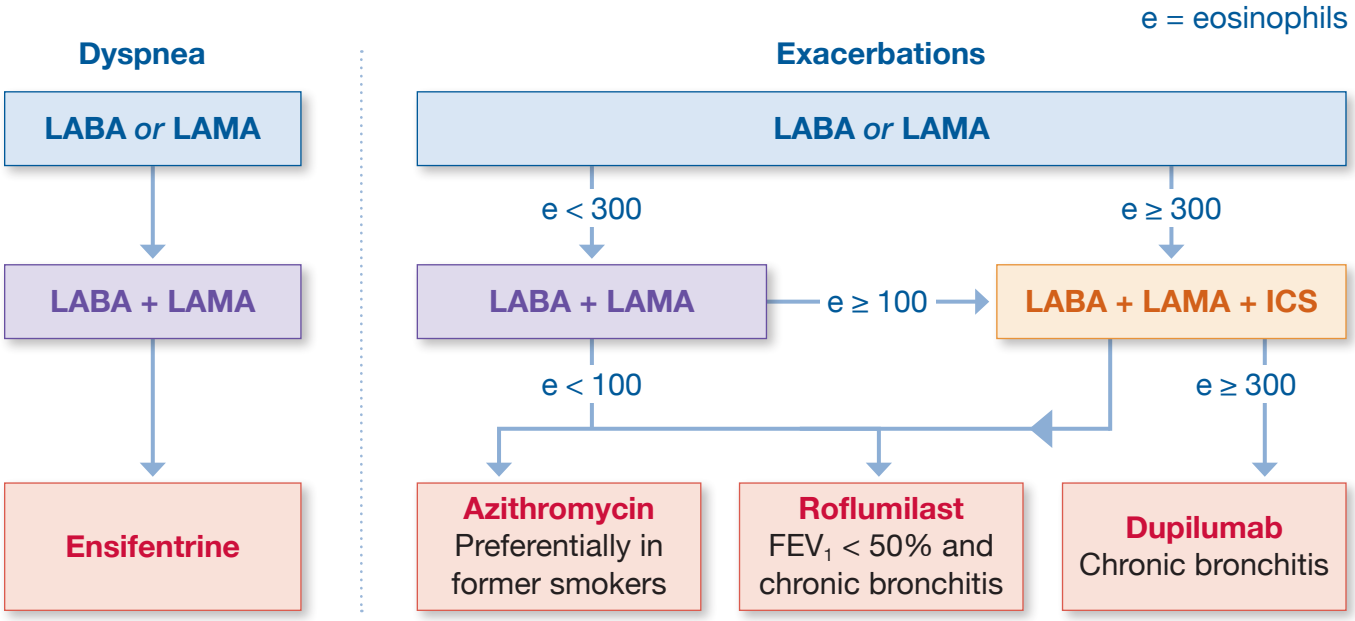
Deciding when to use an inhaled steroid

Strong support for use	Consider use	Against use
• History of hospitalization(s) for COPD exacerbations despite appropriate long-acting bronchodilator therapy • 2 moderate exacerbations per year • Blood eosinophils ≥ 300 cells/µL • History of or current asthma	• 1 moderate exacerbation per year • Blood eosinophils 100-300 cells/µL	• Repeated pneumonia events • Blood eosinophils < 100 cells/µL • History of mycobacterial infection

When to adjust management plans

Escalate treatment if there are worsening symptoms or exacerbations.

FIGURE 4. Identify the current inhaler regimen and adjust based on daily symptoms, exacerbations, and blood eosinophils.[3]



Medications in bottom row: Refer to pulmonologist if available.

The two newest medications for COPD

Ensifentrine (Ohtuvayre)[9,10]

Primary outcome in clinical trial:
FEV_1 87 and 94 mL ↑ than placebo in two trial populations

Secondary outcome of interest:
Symptoms improved weeks 6 to 12

Dosing/brief administration:
3 mg twice daily via nebulizer

Dupilumab (Dupixent)[11]

↓ 30% relative decrease in moderate or severe exacerbations (RR 0.70; 95% CI: 0.58-0.86)

Exacerbations per person-year:
- dupilumab 0.78
- placebo 1.10

Dosing/brief administration:
300 mg SC (subcutaneous) every 2 weeks

Improve inhaler effectiveness

Review inhaler technique.

In patients with worsening daily symptoms or an exacerbation, evaluate with them how they are using their inhaler. Spacer devices can be helpful for any patient using a metered dose inhaler.

American Lung Association.

Inhaler technique videos

Think about changing the device.

If patients demonstrate good technique but are still having problems, an alternate delivery mechanism could be an option. Different types of inhalers may be easier to use for certain patients.

TABLE 2. Types of devices for COPD medications and factors for selection

	Metered dose inhaler (MDI)	Dry powder inhaler (DPI)	Soft mist inhaler (SMI)	Nebulizers
Inhaler class Example inhalers and platforms	 Aerosphere, HFA, RediHaler	 Diskus, Ellipta, Pressair, RespiClick*	 Respimat	 nebulizers
LABA		✓	✓	✓
LAMA		✓	✓	✓
ICS	✓	✓		✓
LABA + LAMA	✓	✓	✓	
LABA + ICS	✓	✓		
LABA + LAMA + ICS	✓	✓		
Rescue inhalers	✓	✓	✓	✓
Tips for use	requires dexterity use a spacer to help with delivery	powder can be irritating requires inspiratory capacity	requires dexterity	requires a nebulizer machine

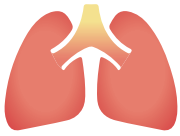
*Platforms shown available in two or more inhalers.

Non-pharmacologic options

Refer patients to **pulmonary rehabilitation.**[3,12]

Reduces readmissions
when started after a
COPD-related hospitalization

Improves symptoms



Improves quality of life

Pulmonary rehabilitation is one of the most cost-effective and valuable strategies for patients with COPD. It can be used at any time, but especially in patients with more symptoms and/or exacerbations, or after a COPD hospitalization.

If patients don't meet coverage criteria for pulmonary rehabilitation, they may meet criteria for similar cardiac rehabilitation, which can provide comparable benefits.

Recommend vaccines to reduce pulmonary infections.

TABLE 3. Encourage all patients with COPD to get vaccinated as appropriate.[13]

Vaccine	Age			
	50-59	60-64	65-74	≥ 75
Influenza	1 dose annually			
Pneumococcus* Pneumococcal conjugate, PCV20 or PCV21	1 dose			
Respiratory syncytial virus (RSV)	Not indicated	1 dose		
COVID-19, using the most updated formula†	1 dose		2 doses, separated by 2-6 months	
Pertussis	1 dose, then Td or Tdap booster every 10 years			
Zoster	2 doses, 2-6 months apart			

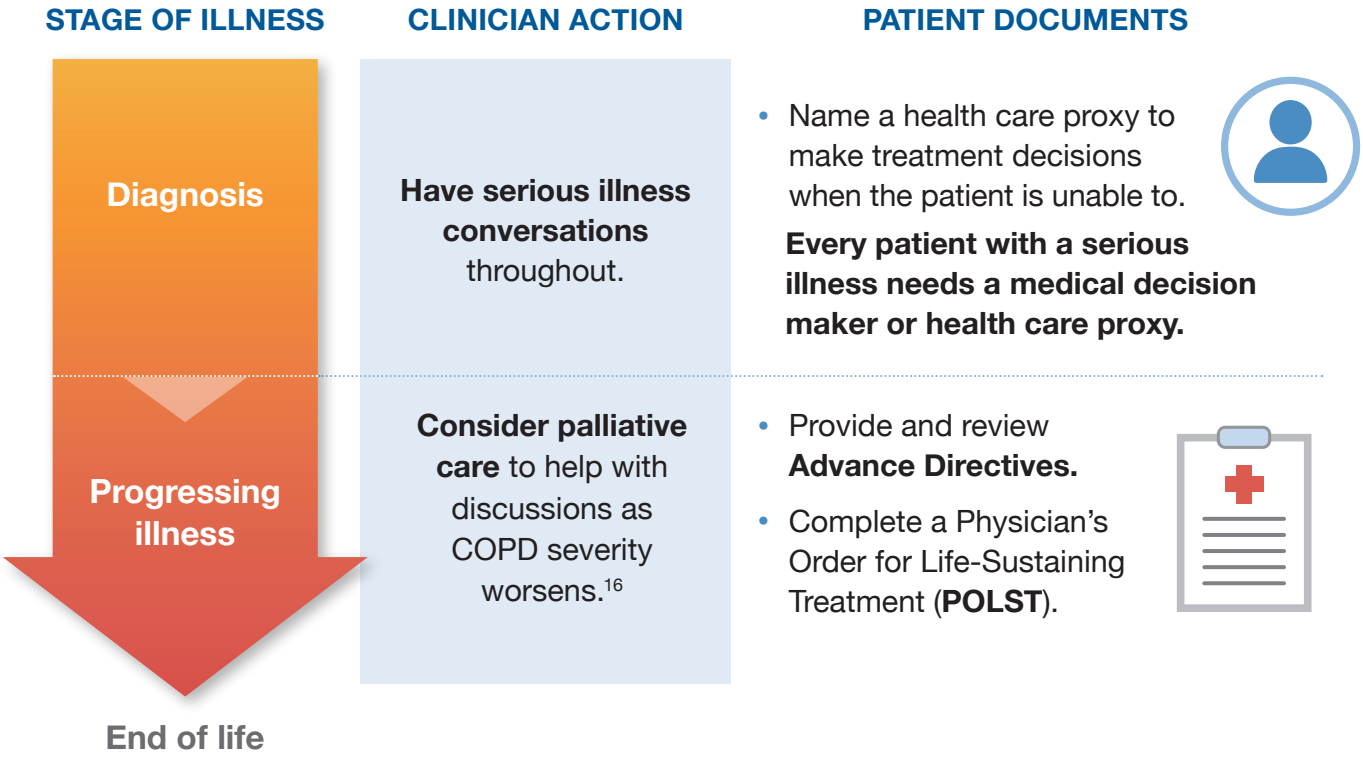
*PCV15 and pneumococcal polysaccharide (PPSV23) can be used as an alternative to PCV20 or PCV21.
†Moderna and Pfizer/BioNTech products only; Novavax requires one more dose if patient is unvaccinated.

Managing patients with advancing disease

Encourage patients to document their goals and preferences.

Advance care planning (ACP) is a continuous process of reflection and communication among patients, those close to them, and health care professionals, to help guide clinical decision-making.

FIGURE 5. Suggest tools to help patients develop and share healthcare decisions to ensure care aligns with their goals, values, and preferences.[14,15]



Prescribe oxygen in patients with chronic resting hypoxemia.[3,17]

Criteria for home oxygen in severe disease:

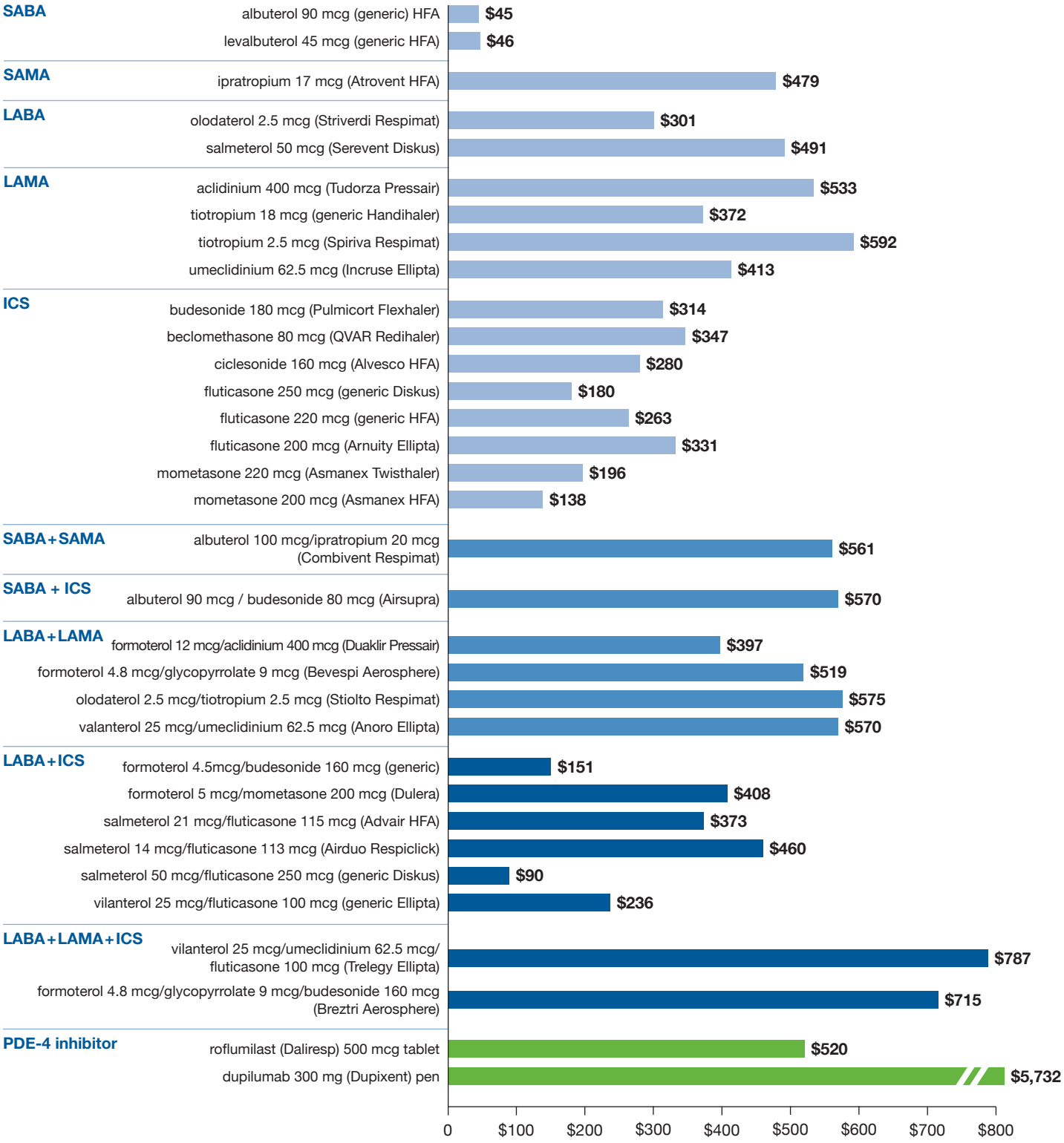
- O_2 saturation ≤ 88%, or
- O_2 saturation of 88% with evidence of pulmonary hypertension, heart failure with peripheral edema, or polycythemia (hematocrit > 55%)

Note: when titrating oxygen, aim for an O_2 saturation > 90%.

Using oxygen for **15 hours vs. 24 hours a day did not change exacerbation rates.**[17]

Cost of inhalers

FIGURE 6. Cost of an inhaler or 30-day supply of medication



Not all inhalers are FDA approved to treat COPD.

Prices from goodrx.com, February 2025. Prices shown are for each individual inhaler or sufficient quantity of oral or injectable medication for a 30 day supply. These prices are a guide; patient costs will be subject to copays, rebates, and other incentives.

Key points

- Prevent COPD by encouraging **smoking cessation** in all patients who smoke.
- **Use spirometry, symptoms, and risk factors** to diagnose and characterize COPD.
- Choose treatment based on **daily symptoms, exacerbation history, and blood eosinophils.**
- **Adjust therapy when needed:** evaluate inhaler technique, change device type, and review the need for an ICS.
- **Prevent exacerbations** by helping with smoking cessation, routine vaccinations, and pulmonary rehabilitation when indicated.
- Discuss **advance care planning,** especially in patients with severe, worsening COPD.

For links to these and other resources, visit AlosaHealth.org/COPD

References:

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About this publication

These are general recommendations only; specific clinical decisions should be made by the treating clinician based on an individual patient's clinical condition. More detailed information on this topic is provided in a longer evidence document at AlosaHealth.org.

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