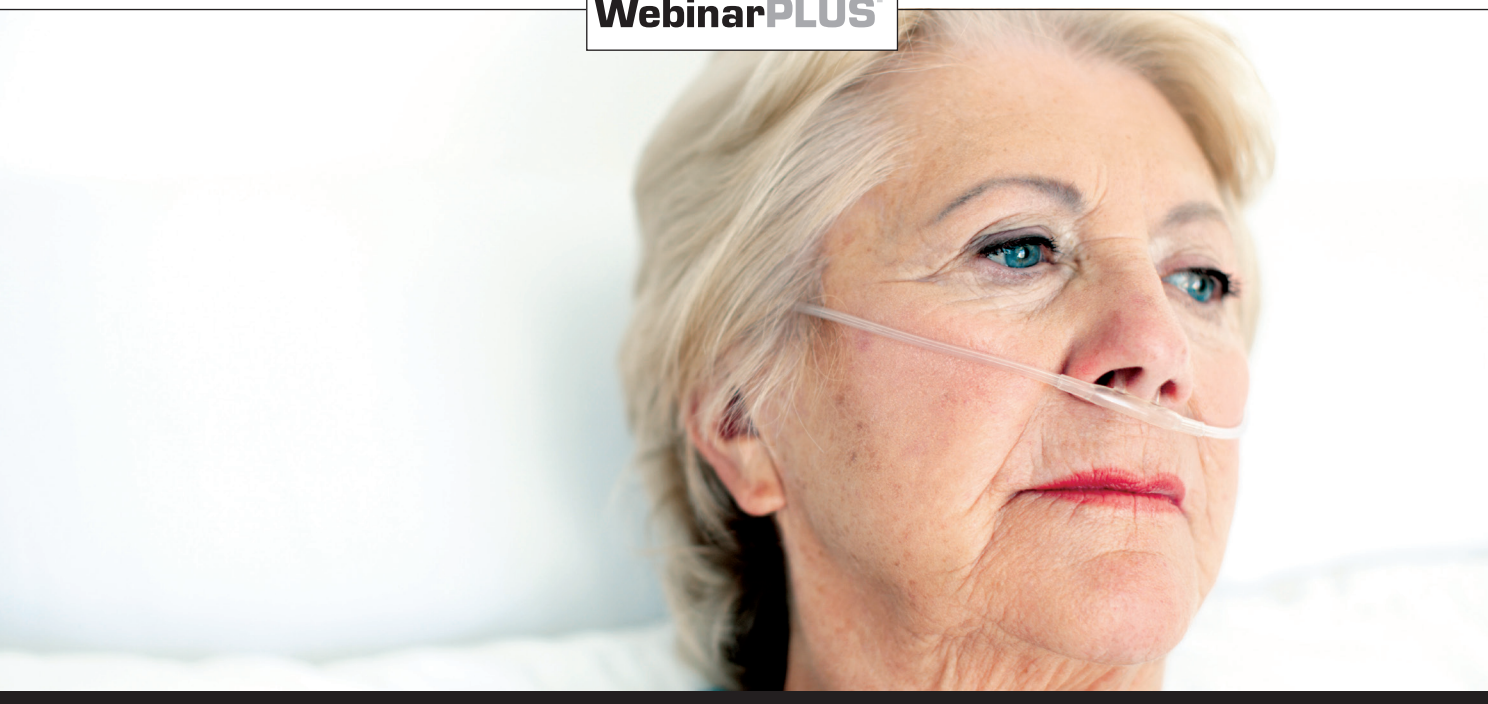
WebinarPLUS+



COPD: MANAGING THE EXACERBATIONS

Mankind is blessed with a few possible do-overs when it comes to the damages inflicted on our bodies, either by accident or some conscious act. Skin, kidneys and livers, for example, are among the organs capable of regenerating and restoring themselves under limited circumstances.

Unfortunately, human lungs never fully recover from the ravages caused by smoking and exposure to a few other post-industrial environmental hazards involving certain airborne particulates. Chronic obstructive pulmonary disease (COPD) is often the evidence left behind, and it inflicts immeasurable pain and suffering, both physical and psychological, on its mostly elderly victims.

In part one of his two-part educational sessions on COPD, Todd King, Pharm.D., CGP, detailed the myriad risk factors associated with COPD, as well as the leading treatments now available to long-term caregivers.

In the concluding webinar on COPD, King, Omnicare's senior director of clinical services for long-term care, delved into the greatest frustration caregivers have with their elderly residents. It is preventing or at least mitigating those dreadful and nearly unavoidable flare-ups all COPD victims experience as the disease runs its course: exacerbations. King left no doubt about the inevitability of these sudden and awful events.

"We've looked at every conceivable opportunity to help those individuals with COPD in our care maintain the highest quality of life they can," he said. "Unfortunately, no matter how hard or how diligently we work at that, there are opportunities and situations where they may actually have an exacerbation."

The special *McKnight's* May webinar, "Management of COPD Exacerbations in Older Persons," was sponsored by Omnicare, a CVS company.

COPD and no looking back

COPD is a progressive and incurable disease, and a reduction of therapy is rarely possible, even after symptoms are controlled. Getting and staying ahead of these manifestations is a critical part of a resident's care, King explained.

Defined by the leading author-

A SUPPLEMENT TO McKnight's LONG-TERM CARE NEWS
IN PARTNERSHIP WITH Omnicare® a CVSHealth company

ity for COPD caregivers — the Global Initiative for Chronic Obstructive Lung Disease (GOLD) — exacerbations are "an acute worsening of respiratory symptoms."

Early in the disease, a victim's first exacerbation can be a frightful thing. The seemingly minor symptoms that accompany the disease — an occasional cough, coughing up a little phlegm, or a feeling of being "winded" — can suddenly and without warning go from 1 to 10 in intensity. Panic usually follows.

The three major signs of an exacerbation are cough, dyspnea (shortness of breath) and sputum purulence and volume. A correct diagnosis relies exclusively on an acute change in these from their baseline levels.

"Managing COPD and its exacerbations is truly a multidisciplinary exercise."

King emphasized the need for appropriate and quick action to prevent further exacerbations once any of the three key symptoms present themselves. Having an exacerbation increases a resident's chances for similar future problems, and those with two or more within a year are considered frequent exacerbators.

"How we can recognize these symptoms really can affect the outcome for the patient," King stressed. "These are key identifiers, so we need to take prompt action with the medical team — whether it's in a nursing home, an assisted living facility, or a retirement home — in order to reduce the severity of these exacerbations and prevent them in the future.

QUICK ACTION NEEDED: Once any of the key symptoms appear, caregivers need to respond with prompt and appropriate action.

"A fundamental goal of treatment is to keep the individual stable," he added. "In other words, to prevent further exacerbations that can permanently worsen their condition. But the fact remains that exacerbations of COPD are very common and when they do happen, the resulting deterioration usually requires additional treatment modifications, including drug and non-drug interventions."

Such visual cues are one way to define an exacerbation. Another way is its severity, which begins at "mild" (which can typically be managed with rescue inhalers, also called short-acting bronchodilators), "moderate" (which adds antibiotics and/or systemic corticosteroids), and "severe" (which is associated with respiratory failure and generally requires transfer to a hospital).

"Keep in mind the prompt notification of the physician of worsening symptoms may prevent a mild or moderate exacerbation from progressing to a hospital-level event," King reminded.

Early detection, treatment

Every caregiver may understand the importance of proper assessments, but there are special considerations when it comes to COPD. In principle, properly assessing exacerbations and their potential involves early detection, prompt treatment and prevention. All three must be dutifully followed, King said.

Successful interventions are always team-focused, and can make the difference between mitigating symptoms and a rehospitalization.

Photo: Clarissa Leahy/Cultura

"Managing COPD and its exacerbations is truly a multidisciplinary exercise that includes nursing, pharmacy, physicians and the patient because it is such a complex condition," he added.

Early detection may involve a number of conditions that mimic or aggravate a resident's exacerbation, including pneumonia, pulmonary embolism, heart failure, cardiac arrhythmias, pneumothorax, anxiety and depression. There are times when one or more of these is actually causing an exacerbation, he noted.

To properly assess dyspnea, early signs may include elevated temperature, pulse, respiratory rate, blood pressure or oxygen levels, and even things like peripheral edema. Symptoms may include elevated cough and sputum production, changes in sputum color, abnormal lung sounds, sleeping difficulties and new or worsening chest pain, King said.

Exacerbation treatment

Outside of hospitalization, 80% of exacerbations are most commonly treated with three kinds of medications: short-acting bronchodilators, oral corticosteroids, and when infections are present, antibiotics.

Bronchodilators

There are three kinds of short-acting bronchodilators, which unlike those that manage COPD in general, are intended for exacerbations:

1) Inhaled short-acting beta-agonists (SABAs). According to King, these are not FDA approved for treating COPD but are supported by the GOLD guidelines. Examples include albuterol and levalbuterol. They can provide rapid symptom relief but come with side effects like rapid heart rate, tremor and insomnia.
2) Inhaled short-acting anticholinergics, which are also called short-acting muscarinic antag-

For more information

The original webcast is available at www.mcknights.com/May21webinar.

onists (SAMAs). A popular one is ipratropium. These have a slower onset than SABAs and may be used for residents who cannot tolerate SABA. Side effects include urinary retention, dry mouth and acute glaucoma if sprayed or nebulized into the eyes.

3) Combination inhaled SABAs/SAMAs. A typical version is albuterol/ipratropium. These combinations may provide a more robust relief of symptoms but have similar side effects as their respective individual agents.

Oral corticosteroids

These medications can improve lung function, oxygenation and recovery time, and decrease the risk of early relapse, King said. He cautioned, however, that they are for short-term use and should be reserved for acute exacerbations of disease.

A typical product is Prednisone 40 mg (or equivalent dose of an alternative corticosteroid). Duration of therapy should not be more than five to seven days, and long-term use of oral glucocorticoids, a class of corticosteroids, has numerous side effects with no evidence of benefits, he added.

Another thing caregivers need to be mindful of: Steroids have been known to make COPD patients jittery or anxious, and can lead to elevated blood sugar.

"This is a good opportunity for us to really interact with that patient and talk about their experience during an exacerbation," King said. "That's a great opportunity for management to listen to the resident and let them tell you what their expectation will be even for that short period of time."

When to use antibiotics

King advised caregivers to use antibiotics for five to seven days when a bacterial infection is suspected, and only when COPD patients have three cardinal symptoms (increased dyspnea, sputum volume, and sputum purulence) or two cardinal symptoms where increased purulence is one of them, or the resident requires mechanical ventilation.

In all instances, King urged attendees to always consider local resistance patterns and recent antibiotic use before embarking on this kind of therapy.

Prevention to-dos

The first step in preventing COPD exacerbations is knowing the risk factors, King said.

A viral or bacterial lung infection is the most common cause for an exacerbation. Other culprits include active or passive smoking, advancing age, interruption of maintenance COPD therapy and delayed recognition of worsening symptoms. They also include exposure to polluted air, frequency of prior exacerbations and other comorbidities such as GERD, heart failure, pulmonary hypertension and thromboembolism.

Meanwhile, up to one-third of severe exacerbation cases cannot be identified.

Many of these risk factors are avoidable. One of those is interruption of therapy.

"If you're in a nursing facility, there really shouldn't be interruptions, but as you go into other settings like assisted living and independent living, it's important for us not to forget there may be situations where the resident is not getting the medication — whether it's because they can't use it or can't afford it," King said. "The drugs we are talking about are really expensive and we need to keep that in mind."

Another avoidable risk is smoking. King urged caregivers to help COPD resident smokers seek smoking cessation therapy as soon as possible.

Photo: KL H49/ E+

CUSTOM CARE: Treatments should always be matched to the severity of the disease, experts advise.

"It may be necessary to stop routine maintenance inhalers during a severe exacerbation, but they should be reintroduced as soon as possible."

Staying ahead

As a resident's condition improves and symptoms subside, caregivers should reintroduce maintenance inhaler therapy with long-acting bronchodilators, and escalate therapy based on the severity scale, he said.

Another consideration is pulmonary rehab.

In any case, King advised caregivers to assess their residents' ability to properly use all prescribed inhaler devices.

"It may be necessary to stop routine maintenance inhalers during a severe exacerbation, but they should be reintroduced as soon as possible," he said. "Additionally, some individuals will require that their maintenance therapy be advanced to decrease the likelihood of future exacerbations."

In all cases, King urged caregivers to always match the treatment to the severity of the disease, as well as the individual's ability to comply with therapy. This includes using inhalers with similar administration mechanics and matching each device to the resident's dexterity, abilities and preferences.

He also touched on the importance of ensuring COPD residents are current on their influenza, pneumococcal and pertussis vaccinations. ■

Editor's note

This McKnight's Webinar Plus supplement is based on a similarly named webinar presented on May 21. The event was sponsored by Omnicare. The full presentation is available at www.mcknights.com/May21webinar.