SUPPORTING EMPLOYEES WITH CARDIOVASCULAR DISEASE (CVD) THROUGH ASPIRIN THERAPY

ACTION STEPS FOR EMPLOYERS:

1. Educate employees about how daily aspirin therapy can help prevent heart disease and stroke in certain at-risk patients.

2. Encourage employees to discuss aspirin therapy with their doctor.

3. Ask health plans to encourage providers and members to make aspirin therapy a priority when appropriate.

4. Ensure that benefit design supports the appropriate use of aspirin therapy.

A recent study from the Patient-Centered Outcomes Research Institute (PCORI) reinforces the positive impact of aspirin, regardless of dose, in preventing heart attacks and strokes in people living with heart disease.

The study’s conclusion is that 81 mg and 325 mg doses of aspirin have similar health benefits when taken daily.

Studies like as this one, which increase our understanding of how best to prevent CVD events, are critical. CVD is the leading cause of death for men and women among most racial and ethnic groups. In fact, about 655,000 Americans die from heart disease each year; heart disease causes one in every four deaths. Many patients who survive a CVD event develop complications such as heart failure or stroke.

Through this Action Brief, the National Alliance, in partnership with PCORI, addresses how employers can support employees and their family members who are living with heart disease by promoting and supporting appropriate aspirin use.

“Aspirin is the most commonly used medication to combat heart disease.”
—William Schuyler Jones, MD, Duke University and principal researcher on the PCORI aspirin dosage study

“CVD IS A PRIMARY HEALTHCARE ISSUE FOR EMPLOYEES AND EMPLOYERS

Every 40 seconds, someone in the United States has a heart attack. CVD profoundly impacts an employee’s quality of life, often disrupting family stability, income security, and the health and well-being of other family members.

The financial impact spreads to the employer, as well. Heart disease and stroke cost employers in expenses and lost productivity, creating a strong motivation for them to take steps to reduce the risk and

“Aspirin can be a powerful intervention to help people prevent major cardiovascular events.”
—John M. Clymer, executive director, National Forum for Heart Disease & Stroke Prevention
Yet one solution to dramatically reduce CVD is simple and readily available: taking a daily aspirin. Aspirin reduces the risk of a CVD event by a remarkable 20%.

**WHAT EMPLOYERS CAN DO TO REALIZE THE BENEFITS OF ASPIRIN THERAPY**

Four employer action steps can help realize the benefit of daily aspirin therapy, yielding healthier employees, higher productivity, and lower healthcare costs.

1. Educate employees about how daily aspirin therapy can help prevent heart disease and stroke in certain at-risk patients.

The most effective way employers can educate employees about health in general, and aspirin therapy in particular, is through worksite screenings and health promotion programs, according to the CDC Workplace Health Resource Center.

High blood pressure is the CVD risk factor most frequently screened among employees and their covered family members:

- Employers and health plans spend $330 billion each year in medical expenses and lost productivity from premature death, heart disease, stroke, and other aspects of cardiovascular disease.

- The average medical cost of a first cardiovascular disease event are $79,253.

- The average cost to an employer of a subsequent employee CVD event is $63,000.1

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### Percent of 95,000 participants with CV event during year-long study

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<thead>
<tr>
<th>Daily Aspirin Takers</th>
<th>Non Aspirin Takers</th>
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<tr>
<td>0.51%</td>
<td>0.57%</td>
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Source: Physicians Health Study, 1988

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INTEGRATING HEALTHCARE ADVANCES INTO EMPLOYER HEALTHCARE PLANNING

National Alliance + PCORI, working together to educate employers

Since 2018, The National Alliance of Healthcare Purchaser Coalitions has helped PCORI familiarize employers with PCORI-funded research findings they can use to improve the health of employees and their families.

The National Alliance sponsors webinars and creates Action Briefs and other communications on PCORI Comparative Effectiveness Research (CER) studies. The goal is to encourage employers to use the findings to educate employees and to apply an evidenced-based approach to healthcare planning and decision making, including discussions and negotiations with healthcare plans and providers.

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STUDY CONCLUSIONS: NO SIGNIFICANT BENEFIT FROM DIFFERENT DOSES

This PCORI-sponsored research compared low and high aspirin doses to determine which is safer and more effective in treating heart disease and preventing heart attacks, strokes and deaths, with less likelihood of bleeding or other side effects.

On May 27, 2021, the ADAPTABLE team reported in the *New England Journal of Medicine* there was “no significant differences in cardiovascular events or major bleeding between patients assigned to 81 mg and those assigned to 325 mg of aspirin daily.”

The study recommends that people with heart disease should discuss the following aspirin dosing guidelines with clinicians:

- **If on 81 mg now:** Maintaining this dose (rather than switching to 325 mg) is probably best, since no differences were found between the two doses.

- **If resuming aspirin:** Starting a lower dose (81 mg) is probably best, due to better tolerability and because there is no conclusive evidence that a higher dose is better.

- **If on 325 mg now and doing well:** Maintaining this dosage may be fine.

The randomized, controlled trial is called ADAPTABLE (Aspirin Dosing: A Patient-centric Trial Assessing Benefits and Long-Term Effectiveness). ADAPTABLE was the first trial to be conducted using PCORNet®, the National Patient-Centered Clinical Research Network, which taps into real-world health data collected during routine care.

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“One with escalating costs, providing benefits to employees has become a bottom-line issue for employers, and increasingly, poor-quality care and chronic diseases are driving costs even higher. Nearly three-fourths of the money spent by private insurance goes to treat people who suffer from chronic illnesses such as diabetes, asthma, heart conditions, and depression.3 Yet, Americans get only half of the recommended care for chronic conditions.”

—Robert Wood Johnson Foundation’s “How Employers Can Improve Value and Quality in Health Care”
Some larger employers have worksite counselors for employees with CVD risk factors, which helps boost follow-through with medical professionals. Employee education can address the issue directly. Employers can provide a guide for employees to use with primary care doctors, such as this one provided by The American Heart Association. The AHA recommends that employees ask these questions of a doctor:

1. What is my risk for having a heart attack or stroke?
2. Would it be good for me to take aspirin to help prevent a heart attack or stroke?
3. What are the side effects of aspirin?
4. How long should I take aspirin?
5. Will aspirin work well with my other medications?

The Workplace Health Promotion area of the Centers for Disease Control and Prevention offers handouts by category:

- Cholesterol
- Heart Attack and Stroke
- Obesity
- Physical Activity

2. Encourage employees to discuss aspirin therapy with their doctor.

According to the CDC, employers could do a better job of referring employees to a health professional for treatment after identifying risk factors. Employers with 50 or fewer employees are successful in referring 19% to 21% of affected employees, while employers of more than 100 refer 31% to 41% of affected employees, according to the 2017 CDC Workplace Health in America Survey.

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“This aspirin dosing study should draw attention to aspirin as a low-cost intervention that could safely prevent heart attacks and strokes. Aspirin gets less attention than its health benefits merit.”

—John M. Clymer, executive director, National Forum for Heart Disease & Stroke Prevention
“This study (aspirin dosing) is creating opportunities for patients to have conversations with their clinicians about the idea that maybe they should be taking aspirin. Employers and employees should care about this option because they care about each other.”

—J. Greg Merrit, PhD, Patient is Partner, LLC

3. Ask health plans to encourage providers and members to make aspirin therapy a priority when appropriate.

For pennies a day, an aspirin a day, when recommended by a doctor as a preventive medication, can save employers, employees and health plans significant costs while improving lives. Aspirin as a preventive medication, even if recommended by a doctor, is only effective if the patient takes it daily.

Yet with all these facts, employers, even though they are the largest purchasers of most health insurance, usually do not leverage their influence with health plans.

An important place for employers to start having a bigger say in the local healthcare market is to join a local or state healthcare purchasing alliance, many of which are sponsored by the National Alliance of Healthcare Purchaser Coalitions (for a list of regional coalitions, click here).

Employers, working in concert with health plans, can gather information from their plans in order to encourage recommended aspirin dosing:

▶ Understand the scope. Ask your plans for spending (claims data) on cardiovascular disease among covered employees and families. How many employees and family members are affected?

▶ Review in-network/out-of-network choices. Are the in-network hospitals, medical groups, and clinics at the top of local or regional rankings for quality-of-care measures? This could lead to a discussion about which providers should be in-network. Such considerations are at the heart of implementing value-based benefit design.

4. Ensure that benefit design supports the appropriate use of aspirin therapy.

Employers can discuss with their consultants, brokers and plan providers the benefit design changes that will support the appropriate use of aspirin therapy:

▶ Request that aspirin therapy be discussed during wellness exams in all cases where it is medically appropriate.

Only about 35% of those who could benefit from aspirin therapy for CVD prevention

“Employers can talk to health plans and PBMs, but regardless they can address this through employee education. This is not about cost. It is about prevention. It’s a message that can resonate with employees.”

—K. Andrew Crighton, MD, Crighton Consulting Group

**AN UNEXPECTED BENEFIT WITH COVID-19**

While aspirin has a pronounced impact on decreasing the incidence of heart attack and stroke, the medication is also proving to be helpful to those infected with COVID-19. A study by researchers at The University of Maryland School of Medicine found that aspirin reduced the risk of death in patients hospitalized for COVID-19.

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<thead>
<tr>
<th>Outcome</th>
<th>Did not receive aspirin dosage</th>
<th>Received aspirin before or during admission</th>
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<tbody>
<tr>
<td>Heart attack</td>
<td>8.90%</td>
<td>8.20%</td>
</tr>
<tr>
<td>Needed ventilator</td>
<td>35.70%</td>
<td>48.40%</td>
</tr>
<tr>
<td>ICU admission</td>
<td>38.70%</td>
<td>50.90%</td>
</tr>
<tr>
<td>Major bleeding</td>
<td>7.20%</td>
<td>6.10%</td>
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Source: International Anesthesia Research Society; 412 patients in study
actually use it. This underutilization could be improved if benefit plans required the discussion during annual physicals or wellness exams with patients who could benefit. The populations least likely to be taking aspirin when appropriate include women and smokers.  

- Suggest zero copayment for care related to managing and monitoring aspirin therapy regimens.

A free aspirin-management benefit in a health plan (including doctor visits, lab tests, and other monitoring) is likely to lower annual healthcare costs. As the chart (“20% Improvement in Prevention of Heart Attack or Stroke”) shows, daily aspirin use by employees with either CVD symptoms or a family history of CVD can reduce the chance of a heart disease event by 20%.

- Ask for health plan designs that offer aspirin at no cost, particularly if recommended by a doctor.

Some plans already offer a pharmacy stipend each quarter for such medications. Clearly, it is of financial benefit for a health plan, particularly a self-insured health plan, to offer free aspirin instead of incurring the costs of treating CVD. Nor is this unprecedented. Health plans often offer free annual flu shots. The federal government offers free COVID-19 vaccinations. Many health plans offer free annual physical or wellness exams. In 2016, the US Preventive Services Task Force recommended that aspirin be offered to employees without out-of-pocket cost if they are age 50 to 69 and have a 10% or higher cardiovascular risk score.

ENDNOTES


