

Information Therapy

How Information Therapy Can Tame the Forces of Consumer-Directed Care and Pay For Performance

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www.healthwise.org

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Disclosure:

I work for Healthwise, a 501(c)(3) nonprofit, that licenses consumer health information to others.







Where I'm coming from

- 1. 31 year's as Healthwise CEO
- 2. A mission to help people make better health decisions
- 3. Board member of the Center for Information Therapy



Not-for-profit

200 employees

Working through health plans, portals, disease management & hospitals





Aetna, Cigna, Humana Kaiser, United, WellPoint, WebMD, MSN, AOL, Yahoo Healthways, Health Dialog, Matria Sutter, PAMF, MGH, Dartmouth-Hitchcock



Learning Objectives

- 1. The Information Therapy concept (Ix)
- How Ix can help CDHP members improve health and lower costs
- 3. How Ix can help physicians and hospitals earn more from Pay-for-Performance incentives





Pay for Performance

- Leapfrog Group
- Bridges to Excellence
- RWJF/CHCF
- Centers for Medicare and Medicaid

"If you do well on our quality indicators, we'll pay you more money."

"Plus, you look good in your community, too."





- HbA1c Control - Blood Pressure Condicator can be advanced directly of patients. - Eye/Foot Examply indicator can be advanced directly of patients. - Eye/Foot Examply indicator can be advanced directly of patients. - Eye/Foot Examply indicator can be advanced directly of patients. - Eye/Foot Examply indicator can be advanced directly of patients. - Eye/Foot Examply indicator can be advanced directly of patients. - Eye/Foot Examply indicator can be advanced directly of patients. - Use of Aspirin

- Many more.....





Consumer-Directed Health Care

"If you please us, we will come"....

"and if you don't, we won't"

How you can please us:

- More information (transparency)
- Lower costs
- Better service
- A Personalized experience





Consumer-Directed Health Care

Help us decide:

- What treatments? And from whom?
- What can we do for ourselves?
- How else can we limit the cost?



Every question and into need can be answered through information prescriptions to patients.



"Information Therapy"

The <u>prescription</u> of specific evidence based medical information

to a specific patient, caregiver, or consumer at just the right time to help them make a specific health decision or behavior change

as part of the process of care





The "x" in Medicine

- Rx = Medications
- Sx = Symptoms
- Hx = History
- Dx = Diagnosis
- Tx = Treatment





Ix = Information Therapy



"Why is Ix Needed?" We Need Improved Communication



"...between half and four-fifths of all medical information... was forgotten instantly by the patient."

Roy P C Kessels PhD J R Soc Med 2003; 96:219-222



"Why is Ix Needed?" Doctors are not so good at Involving Patients



Only 9% of decisions are rated as "informed decisions."

JAMA, Vol.282 No.24, December 22/29, 1999



"Why is Ix Needed?"

Because patients can close billion dollar gaps



- Aspirin for heart patients
- Beta blockers
- Pre-diabetes self management
- Asthma controls
- Back surgery variation
- High blood pressure mgmt.
- Depression management
- CDHC provides an incentive
- P4P aligns it with MD's interest





Assumption

The consumer is the greatest untapped resource in healthcare

We can solve neither the cost nor the quality problem without information therapy to inform and engage the consumer.





How Ix with Metadata Works

Information triggers



■ ICD-9, CPT-4, SNOMED

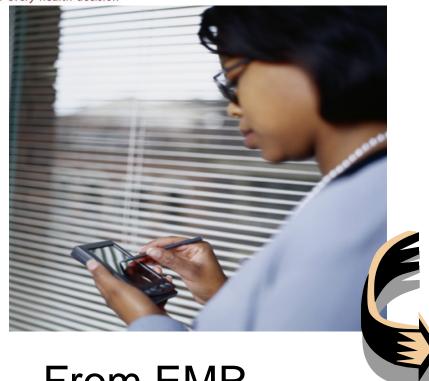
Moments in care

Diagnosis, Treatment, Discharge

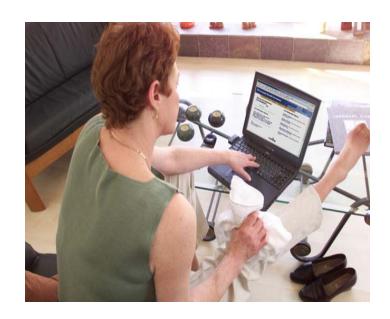
Information prescription

•http://www.healthwise.net/hworg/Content/StdDocument.a spx?DOCHWID=hw130547&SECHWID=hw130550





Clinician Prescribed: The "Ideal" Application



From EMR...

... to PHR



Becoming a part of every doctor visit



Information Therapy Strategies for Clinicians

- Patient Instructions/After Visit Summaries
- Visit Prep/Test Prep
- In-depth Campaigns
- Personal Prevention Plans
- Virtual Coaches





Ix Patient Instructions

Based on your information:



- The right book

And even translates the book into lay language but you still have to find the pages you need.





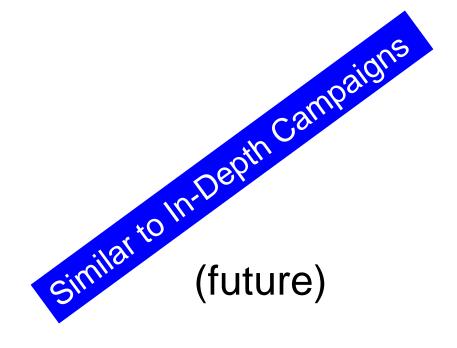
What's Next?

Time Sequence PIs

Just in time information

- Day One
- Day Two
- Week Two
- Week Four







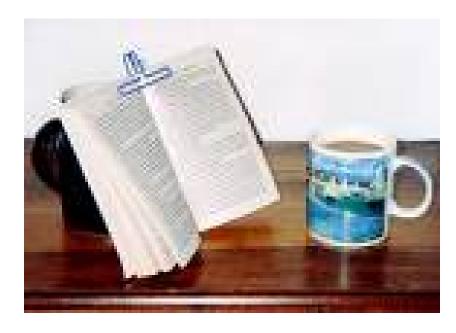
What's different about "Ix" Patient Instructions

- Rather than the end of an encounter,
 Patient Ix should be the start of a process
- Linked to more information on the Web
- Set up as an interactive series of messages
- Timed with expected changes in the "moment in care"







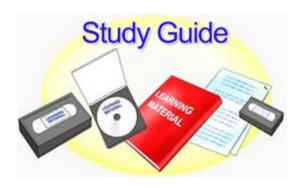


In-depth Ix Campaigns

Right Page











Shauna's Asthma

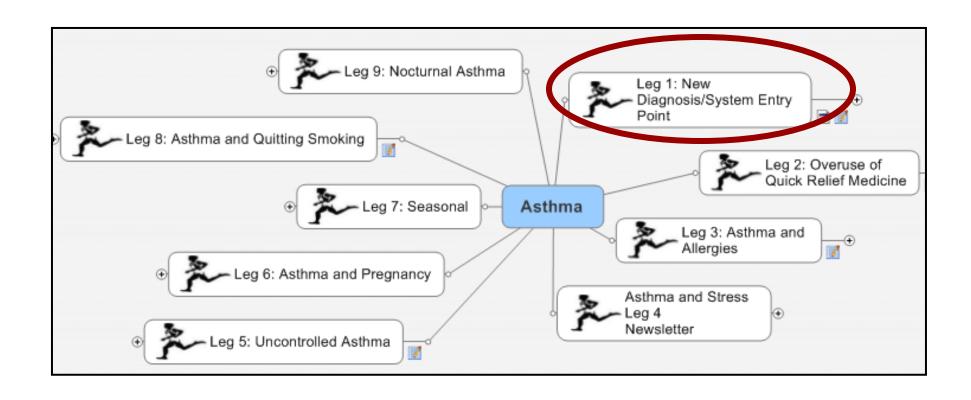
Trigger: New Diagnosis

Moment in Care: Early Treatment





Asthma In-Depth Campaign







Asthma: New Diagnosis



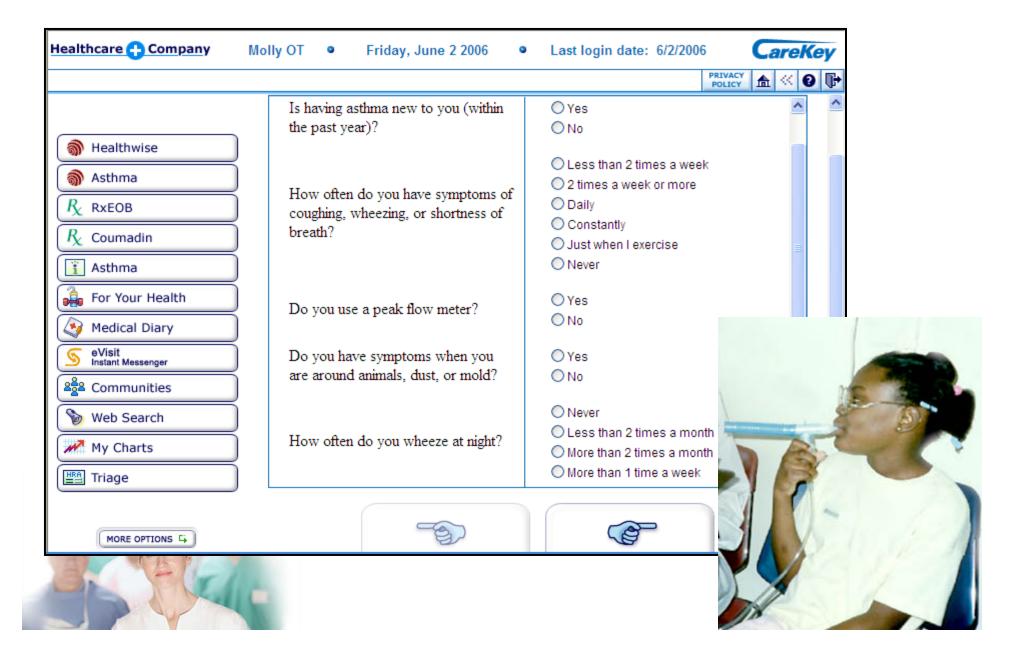
Initial contact

- Introduction letter
- When to call
- Asthma Assessment
- All About Asthma page





Asthma Questions





New Diagnosis

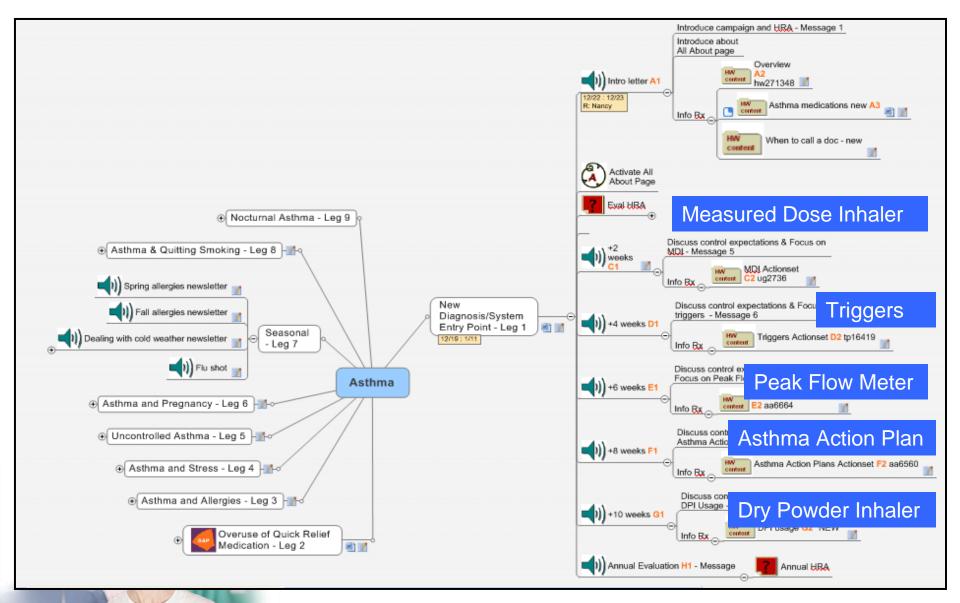
- Initial contact
 - Introduction electronic letter
 - Asthma HRA
 - All About Asthma page
- 2 Week Intervals
 - Metered Dose Inhaler
 - Triggers
 - Peak Flow Meter
 - Asthma Action Plans
 - Dry Powder Inhaler Usage





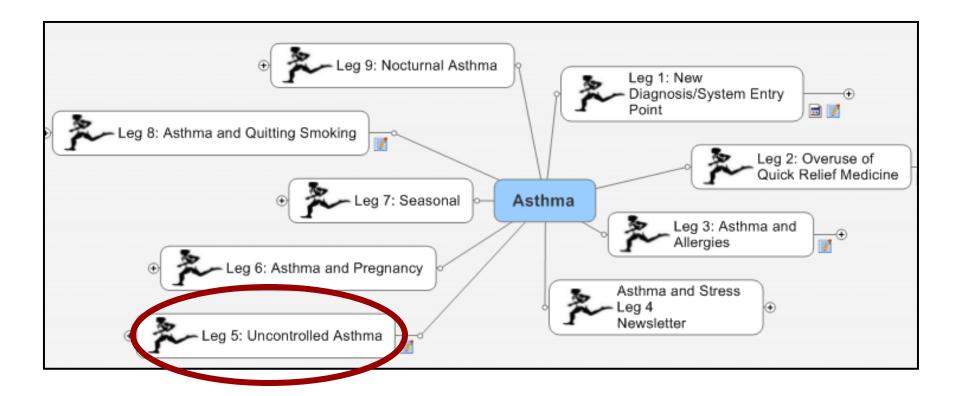


Asthma In-depth Campaign





Asthma In-Depth Campaign



Trigger: ER visit

Moment in Care: Uncontrolled Asthma





Asthma E-Zine • Too Much Medicine?

How Much is Too Much?

▶Check out these hot topics:

- Are you <u>overusing</u> rescue medicine?
- · What overuse can do to you.
- A refresher course on using a metered dose inhaler may help.
- Find out why you may be overusing rescue medicine and what to do about it.



YOUR ANSWERS LET US GIVE YOU INFO THAT YOU NEED NOW.

Go to your Reminders button. Here you will find the asthma medicine overuse quiz. Take it today!

Learn about your medicines.



Read Helen's story

"I've got the shakes!"





Rescue Medications

How do you use a rescue inhaler? (examples of rescue medicines: albuterol, ventolin, maxair, atrovent)

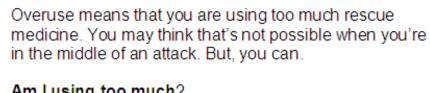
- ☐ 2 times a week or less
- More than 2 times a week
- □ Daily
- ☐ Just when I exercise or play sports
- ☐ I don't use an inhaler





In the guiz about rescue medicine, you said:

What is Overuse?



Am I using too much?

The answer is "yes" if you use your rescue inhaler every day. That means you are having asthma symptoms every day and that's not good. Talk to your doctor.

Are you using your rescue inhaler more than 2 times a week? If yes, think of it as a warning sign and talk to your doctor.

Why is this a problem?

When your asthma symptoms are not well controlled, you are more likely to have a serious asthma attack, which can mean a trip to the emergency room or a stay in the hospital. Attacks could also happen more often.

What can I do about it?

If you think you are using too much rescue medicine, talk to your doctor. You might need to think about:

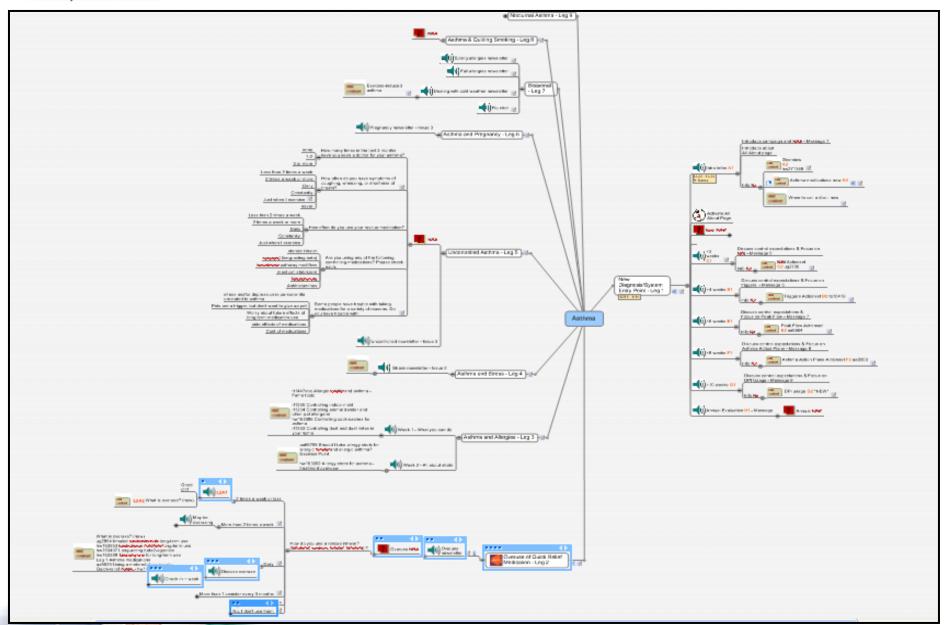
Using controller medicine

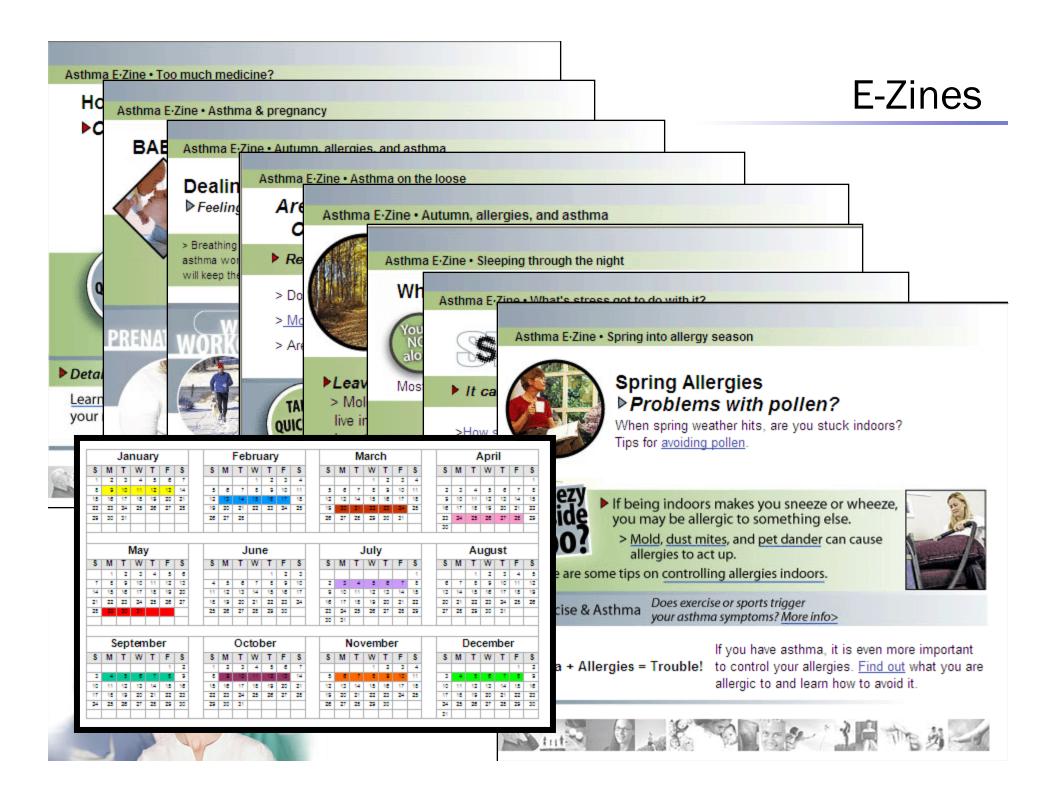
Not everyone who has asthma needs controller medicine. But if you are using





Asthma Smart Campaign







Simpler Solutions

- Ix Prescription Pads with check-off boxes
- Wall Charts with recommended URLs
- Print-to-Web approaches through books and handouts

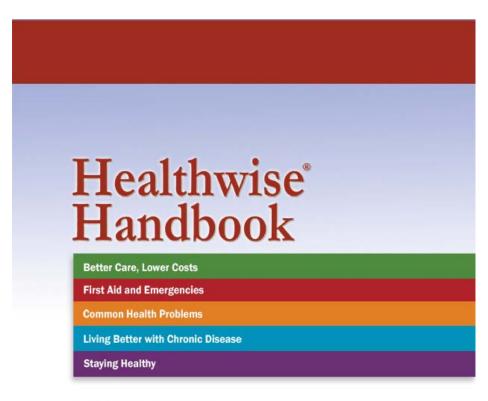




Print to Web Engagement

- Plain Language
- The Key Basics
- Print-to-Web





A Self-Care Guide for You and Your Family



Ear Infections

Home Treatment

- Put a warm washcloth on the ear to relieve pain, or use a heating pad set on low. Do not use a heating pad on a baby or a child who cannot tell you if it's too hot. Do not send your child to bed with a heating pad.
- Give your child acetaminophen (Tylenol) or ibuprofen (Advil, Motrin) for pain.
 Do not give aspirin to anyone younger than 20.

- Have your child drink plenty of clear liquids.
- If the eardrum ruptures, avoid getting water in the ear for 3 to 4 weeks. Showers or baths are fine, but do not let your child soak his or her head in the tub.
 Swimming in pools is fine also, as long as the child uses earplugs.

Preventing Childhood Ear Infections

- Breast-feed your baby. Breast-fed babies have fewer ear infections. If you bottlefeed your baby, hold the baby upright to drink. Never let a baby or young child lie down with or go to sleep with a bottle.
- Do not smoke in your home or around your children.
- Take your child to a smaller day care center. Fewer children means less contact with germs and illness.
- Wean your child from his or her pacifier by about 6 months of age. Babies who use their pacifiers after 12 months of age.

What About Ear Tubes?

Some children seem to get ear infections all the time. These children often develop fluid behind the eardrum and hearing loss. The hearing loss is usually temporary, but it is more of a concern in children age 2 and younger. Normal hearing is important when young children are learning to talk.

If your baby or young child often has ear infections and fluid in the ear, you may want to talk to your child's doctor about ear tubes. Ear tubes are put in the eardrums to drain fluid and help restore good hearing.

The doctor may want to test your child's hearing first. If there is no hearing loss,

Does Your Child Need Antibiotics?

Antibiotics can treat infections, but most children with ear infections get better without them. If the care you give at home relieves pain, and your child is feeling better after a few days, your child may not need antibiotics.

There are exceptions to this. Your child may need antibiotics right away if:

- He or she is younger than 2. The risk of other problems is higher for very young children. Also, a loss of hearing for even a short time may affect how your child learns to talk.
- Your child is very ill, has a high fever, or is in severe pain.
- Your child has a serious long-term health problem (like heart disease or cystic fibrosis).

In most other cases, your doctor may suggest that you wait 48 hours before you give your child antibiotics. If after 48 hour your child has not improved and needs antibiotics, you will have to wait at least another 48 hours for the antibiotics to take effect. There are good reasons not to use





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diff



If you are not sure what's best for your child and need help deciding, go to the Web site on the back cover and enter i279 in the search box. If you are not sure what's best for your child and need help deciding go to the Website on the back cover and enter i279 in the search box.

Earwax helps keep the ears clean and keeps out dust and water. Normally, earwax drains freely from the ears and does not cause problems. As a rule, it is best to leave earwax alone. You can avoid most earwax problems by not using cotton swabs in your ears.

More

146



cle the answer that best applies to you			3.7.4	
My child is younger than 2 years of age.	Yes	No	NA	ld
My child has a medical condition that makes him or her more susceptible to infections.	Yes	No	Unsure	out
My child has taken courses of antibiotics for repeat ear infections.	Yes	No	Unsure	other it to
I am concerned about developing drug-resistant bacteria.	Yes	No	Unsure	niting,
I am comfortable delaying treatment for 48 hours to see if the condition improves.	Yes	No	Unsure	want to
I am concerned about possible side effects of using antibiotics.	Yes	No	Unsure	



Simpler Solutions

Another alternative is to encourage people to start with the Web.



Your plan

Get health advice

Appointments/R_X refills

Locate our services

Mailbox

Health encyclopedia

Search tips



Web-First Engagement Search or browse

our health encyclopedia

Nisite la Guía de salud práctica de Healthwise® en español.

Choose a letter to browse health topics beginning with that letter. For example, click on the letter "A" for information about asthma.

A B C D E F G H I J K L M N O P Q R S T U V W X Y Z

O to 9 (these health topics begin with numbers)

You can also search for a health topic by entering it in the field below.

Earache

Search

Terms & conditions

Privacy practices

Site policies

About us Careers

Contact Web manager

Web awards & accreditations



Healthwise® Knowledgebase

More than 5,500 topics on:

- Symptoms
- Health conditions
- Treatments
- Medical tests
- Medications
- Wellness
- Medical consumerism







Symptom topics

Ear Problems and Injuries, Age 11 and Younger

Topic Overview



Ear pain in children may be a sign of an infection in the space behind the eardrum (<u>middle ear</u> <u>mon</u>). Ear infections (<u>otitis media</u>) most commonly occur when cold symptoms, such as a runny or stuffy nose and cough, have been present for a few days.

@www.nucleusinc.com

An ear infection may occur when the <u>eustachian tube</u> swells and closes and fluid from the throat

accumulates in the middle ear. The combination of fluid and germs (from bacteria or viruses) creates a perfect environment for an infection. Swelling from the infection causes pain from increased pressure on the eardrum. The pressure can cause the <u>eardrum to rupture</u> (perforate). A single eardrum rupture is not serious and does not cause hearing loss. Repeated ruptures may lead to hearing loss.

Middle ear infections are more common in children than in adults. Young children have short, soft, more horizontal eustachian tubes that are more easily blocked than those of older children and adults.

Ear infection is the most commonly diagnosed <u>bacterial infection</u> in children younger than age 7. By that age, approximately 93% of children in the

Topic Contents

▶ Topic Overview

Check Your Symptoms

Home Treatment

<u>Prevention</u>

Preparing For Your

<u>Appointment</u>

Related Information

Credits







Check Your Symptoms

If you answer yes to any of the following questions, click on the "Yes" in front of the question for information about how soon to see a health professional.

Review <u>health risks</u> that may increase the seriousness of your child's symptoms.

- Yes Has your child had an injury to the ear?
- Yes Does your child have <u>drainage from the ear</u> that does not appear to be earwax?
- Yes Does your child have ear pain with a fever?
- Yes Does your child appear to have <u>ear pain</u>? See <u>evaluating</u> pain in a child.
- Yes Does your child have <u>redness</u>, <u>swelling</u>, <u>or pain in the external ear or behind the ear?</u>
- Yes Is your child taking an antibiotic for an ear infection without an improvement in symptoms, or have new symptoms developed?
- Yes Does your child appear to have a hearing problem?







Check Your Symptoms

If you answer yes to any of the following questions, click on the "Yes of the question for information about how soon to see a health profe

Review <u>health risks</u> that may increase the seriousness of your child' symptoms

Yes Has your child had an j	injur	y to the	ear?
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- Poes your child have drainage from the ear that does appear to be earwax?
- Yes Does your child have ear pain with a fever?
- Yes Does your child appear to have <u>ear pain</u>? See <u>evalua</u> pain in a child.
- Yes Does your child have <u>redness</u>, <u>swelling</u>, <u>or pain in the</u> external ear or behind the ear?
- Yes Is your child taking an antibiotic for an ear infection wit improvement in symptoms, or have new symptoms developed?
- Yes Does your child appear to have a <u>hearing problem</u>?

Symptoms

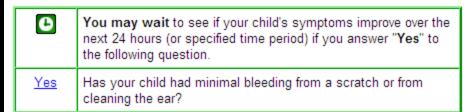
When to See a Doctor

You have answered Yes to:

Does your child have <u>drainage from the ear</u> that does not appear to be earwax?

•	Call your child's health professional immediately if you answer "Yes" to any of the following questions.	
<u>Yes</u>	Does your baby younger than age 3 months have any drainage from the ear?	
<u>Yes</u>	Does your child, age 3 months or older, have unexplained bleeding from the ear?	

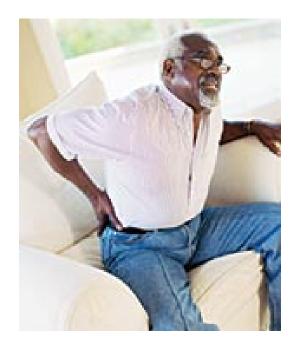
•	Call your child's health professional today if you answer "Yes" to the following question.
<u>Yes</u>	Does your child, age 3 months or older, have drainage from the ear that looks like pus or fluid that is white, yellow, or bloody?



If you have answered "No" to the above questions, go back to Check Your Symptoms and continue to answer the questions to evaluate your Symptoms.











Know a friend with a bad back?

Try a book, the Web or a nurse



Health conditions

Herniated Disc

Topic Overview

What is a herniated disc?



The bones (vertebrae) that form the <u>spine</u> in your back are cushioned by small discs. These discs are round and flat, with a tough, outer shell (capsule or annulus) that surrounds a

nock absorbers for

ormal, everyday

to bulge slightly.

Spine

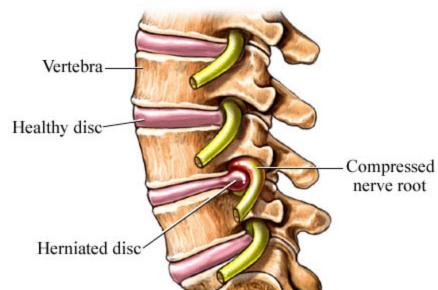
The spine is composed of 33 interlocking bones called vertebrae that are separated by soft, compressible discs and supported by

many different ligaments a (vertebra) has a hole in its of one another to form the through the center of the c

The spinal cord is a nerve through the spinal canal to out through other openings



Herniated disc



Topic Contents

▶ Topic Overview

Health Tools M

Cause

Symptoms

What Happens

What Increases Your Risk

When To Call a Doctor

Exams and Tests

Treatment Overview

Prevention

Home Treatment

Medications

<u>Surgery</u>

Other Treatment

Other Places To Get Help

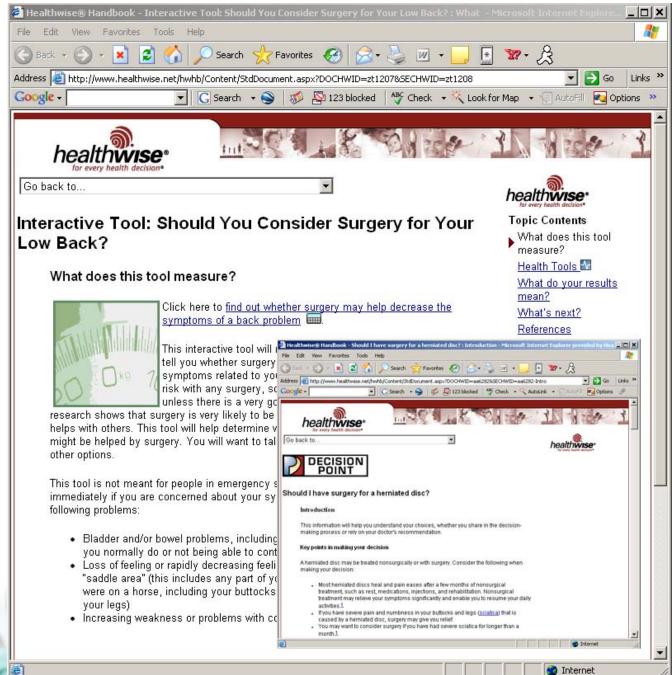
Related Information

References

Credits









Lifting properly to prevent back injury

Introduction

No one is immune to back injury. Whether you have a strong back or have hurt your back before, it is well worth it to:

- Stop yourself before casually picking up a light or heavy load.
- Plan in your mind for the best way to lift what's in front of you. This
 could include enlisting help from one or more people.
- · Lift and move slowly and carefully.

The time you take to use the right lifting mechanics is far less weeks, or months it can take to heal from a back injury.



What types of lifting can cause injury?



How can I lift without hurting my back?

Follow these basic rules to protect your back while lifting:

- Squat down, bending at the hips and knees only. If necessary, put of knee to the floor and extend your other knee in front of you, bent at a right angle (half kneeling).
- Press your chest straight forward (enough to allow a person in front you to read a name tag pinned to your chest). This helps keep your upper back straight while maintaining a slight arch in your lower back
- Slowly lift by straightening your hip and knee joints (not your back).
 you are half kneeling, straighten one leg or the other first, keeping yo back straight.
- Hold the load as close to your body as possible, at the level of your navel
- . Use your feet to change direction, taking small steps.
- Lead with your hips as you change direction. Keep your shoulders parallel line with your hips as your move.
- . Set down your load carefully, squatting with the knees and hips only.

Actionsets

Proper lifting technique



Follow these tips to avoid compressing the spinal discs or straining your lower back when lifting:

Squat down, bending at the hips and knees only. If necessary, put one
knee to the floor and extend your other knee in front of you, bent at a right

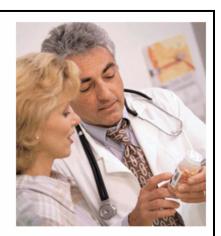


Dear Anna:

It isn't easy making a decision whether or not to have surgery. **This information** gives you specific points to consider when deciding if back surgery is best for you.

As you weigh the medical facts, keep in mind that your needs and desires are equally important.

If anything you read doesn't make sense to you, be sure and talk with your doctor.



Messages can target major decisions at each new moment in care.





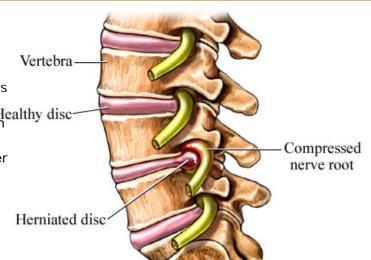
SURGERY FOR BACK PAIN

Feel Better

This information on surgery for a herniated disk will help you understand your choices, whether you share in the decision-making process or rely on your doctor's recommendation.

Key Points

- •Most herniated discs heal and pain eases after a few months of nonsurgical treatment, such as rest, medications, injections, and rehabilitation.
- •If you have severe pain and numbness in your buttocks and legs (sciatica) that is caused by a herniated disc, surgery may give you relief.
- •You may want to consider surgery if you have had severe sciatica for longer than a month. 1
- •You will probably experience faster pain relief if you have surgery. However, after 4 to 8 years, the results from nonsurgical treatment are as good as are surgery results. 1



What is a herniated disc?

The bones that form the spine in your back are cushioned by small discs. Spinal discs are round and flat, with a tough, outer layer that surrounds a jellylike material. They act as shock absorbers for the spine and keep the spine flexible. When they are damaged from an injury, normal wear and tear, or disease, they may bulge abnormally or break open. An abnormally bulging or ruptured disc is called a herniated disc, or sometimes a slipped disc.

more



Ix Applications for Hospital P4P

- Decision Support
- Disease Management & Self-Management
- Personal Wellness and Prevention Plans
- Time Phased Post-Discharge Instructions
- Adherence Aids for Long Term Meds





Ix Applications for Provider CDHC Success

- Patient Instructions with Web Links & visit summary
- Test Prep
- Test Results & Explanation
- Hospital Stay Success Guides (reduce errors)
- Decision Aids for Surgical/Treatment Decisions
- Medication Decision Support
- Personal Prevention Plans





Ix Discussion





Healthwise® Information Therapy

In-Depth Ix Campaign Discussion

Where would these campaigns work best?

Are incentives necessary/appropriate?





The Medencentive Model Quality Incentives for Doctors and Patients

- EBM Guidelines for the Physician
- Ix for the Patient
- P4P for both
- Checks and balances





P4P for Physician and Patient with checks and balances

- Physician: 20% 40% premium
 - Acknowledge guidelines
 - Prescribe information
 - Rate patient compliance
- Patient Rewards:
 - Open Ix & Answer Questions
 - Declare compliance to EBM
 - Authorizing release of MD's rating of their compliance (augment reward)





- www.medencentive.com
- PowerPoint from 2005 Ix Conference

http://www.ixcenter.org/conf_mat05/greeneppt.pdf





What's Next?

The Virtual Coach

The next generation in patient engagement

Reaching the previously hard to reach—better





Engaging those at Risk

Comfort and Learning:

- Words
- Pictures
- Conversation

A wise friend:

- Always there
- Always on your side
- Always with the info I need









A Conversation Interface

- Comfort of a Conversation
- Personalization of a two-way exchange
- Quick jump from virtual to actual coaching





The more you tell me about you.....

- Conditions & Symptoms
- Treatments & Tests
- Health status & Health habits.
- Readiness to change
- Age, sex, education level
- Reading style

The more helpful I can be







- Easy to talk with
- "It seems like a real person"
- A wise friend who will guide you to the most helpful information.





The Virtual Coach Continuum

Basic Interactive

Gathering Information

Triage & Decision Making

Pushing Information and Helping Make
Better Decisions

What is eczema?

Ix asthma rescue meds overuse questionnaire

What to do when your child has a fever

Motivating patients to continue taking beta blockers after heart attack

Increasing Levels of Interactivity and Involvement





This is a sample of an interactive conversation.

While the sample offers less interactivity and less quality than the I might like, it demonstrates some possibilities of the process.

Sleep Apnea Example

http://www.rush.edu/rumc/page-1119821272844.html





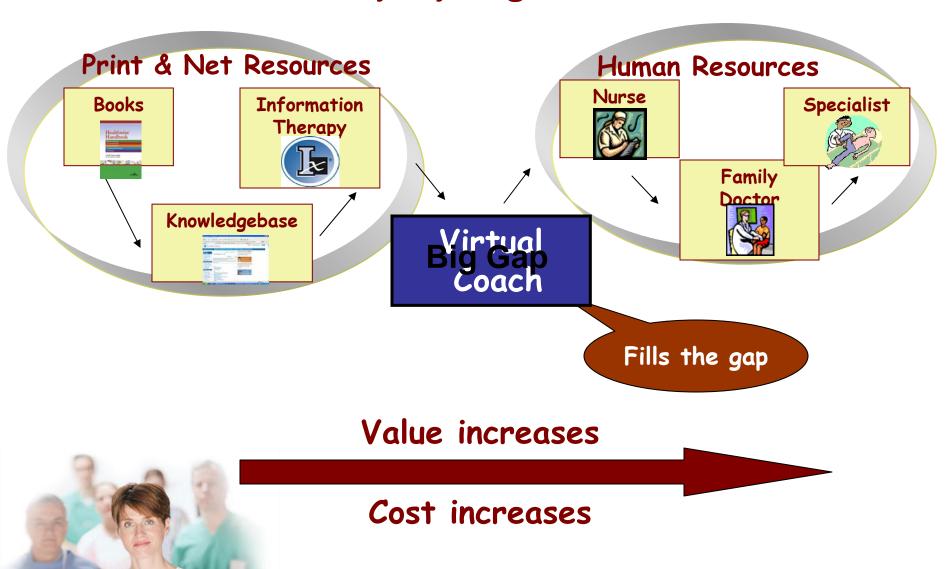
The Challenge:

- Much higher production values
- Production equipment and facilities
- Voice talent
- Liability Issues





There are many ways to get health information.





Virtual Coach Discussion

Will it work?

On what topics?

With what people?

On what technology?





Free access to the Healthwise Knowledgebase:

http://demo.healthwise.net

User Name: Consumer

Password: Summit

Expires: 11/30/06

