



Liver Health Initiative

Outreach Worker Training Session - Script

Introduction

- Thank you for joining us today, for our Liver Health and Wellness Training Session. The goal of today is to inform you about our organization, and why liver health education is so vitally important in the prevention of numerous, chronic diseases that have quickly become national public health crises.
 - **Question:** How many of you learned about the liver throughout your own educational experience? Was it ever emphasized how important it is to hundreds of life sustaining body functions?
- *Emphasize:* Our approach, is using quick and simple messages that relate to your personal life, and highlight the integral role your liver plays in maintaining your health and life itself. Our stories and analogies easy to retell and memorable, inspiring individuals to share this information. We like to start off by taking you through a day, and highlighting how much we depend on our liver in order to do our daily activities.

A Day With Your Liver

1. **Energy**

Did you know that your liver is responsible for getting you up in the morning? It's true! You would not have even made it out of bed, if it hadn't been for your liver feeding you back some of the energy it stored from the meal you ate last night. That's why when your liver is compromised, one of the first things to go is your energy. Without your liver, you'd be limp as a puppet and couldn't walk, talk, or even think.

2. **Digestion**

That leads right into breakfast, and more importantly, digestion. You wouldn't be able to digest your breakfast and have usable energy for the day, if it weren't for the nasty tasting, green bile created by your liver.

Bile has 2 main functions:

1. It acts like a detergent, and breaks up the fats in the food you ingest so the vitamins, minerals and nutrients they contain can be absorbed and carried over to your liver to help make your bones strong and keep you healthy.

That means, without a healthy liver, your bones would be brittle and your muscles would be weak.

2. Bile detoxifies and carries away the toxins/poisons in alcohol, drugs (all drugs are made of chemicals) and other wastes produced in processing the food you eat.

Without the bile your liver produces to break up the fats, they'd be carrying all the vitamins through your digestive system, causing diarrhea, and you'd be on the toilet all day.

3. **Cholesterol**

Question: How many of you try to go jogging or exercise regularly because you're worried about the globs of cholesterol that might be clogging up your blood vessels?

Well, did you know that your liver is responsible for controlling the production and excretion of cholesterol in your body? If we knew why it was bad in some people and good in others, we wouldn't have so many heart attacks and strokes.

4. **Clotting Factors**

Now gentlemen (and ladies), imagine this. You go to the bathroom in the morning to shave, and you accidentally nick yourself. No big deal, just mop it up with a tissue. But that's only because your liver makes clotting factors that help stop cuts from bleeding. With a damaged liver, your blood would take forever to clot and you'd be mopping up that mess all day.

5. **Immune Factors**

Question: And now, remember itching a scratching from chicken pox? Wasn't that the worst?

Well thank goodness for your liver. Because once you got the chicken pox, your liver made immune factors that help protect you from getting it over and over again. Without your liver, you'd be a sitting duck for every germ and virus out there.

6. **Hormones**

And then you have hormones. The liver is responsible for producing hormones essential in numerous body functions including stimulating body growth, regulating blood pressure, and cell maintenance.

Bringing It All Together

- So what are we trying to say here? Short and sweet, your liver is your guardian angel and internal chemical power plant.
 - Everything you eat, breath, and absorb through your skin has to be refined and detoxified by the liver – including drugs and alcohol.
- Liver cells are mini chemical factories that serve as:
 - The employees in your chemical power plant
 - The computer chips in your cell phone

Things That Harm Your Liver

- Drugs, alcohol, hepatitis viruses all attack and kill liver cells, the employees in your powerplant – they turn into scar tissue, called cirrhosis.
- Continued assault causes buildup of so much scar tissue, that it disrupts blood flow and disables you from absorbing nutrients, creating immune and clotting factors, and more.

- This can happen without warning!
- When too many liver cells are damaged and too few healthy cells remain, the liver is unable to perform its life sustaining tasks and shuts down. When your liver shuts down, so do you.

Examples

Chemistry Class

- Think about chemistry class.
- Question: Anyone remember pouring things into a beaker, and mixing all the ingredients? Sometimes you suddenly have blue smelly cloud!
- Same thing happens when you mix and match different drugs and alcohol. All drugs, are made of chemicals. Even over the counter ones. You may think that things sold at the pharmacy counter have an invisible “safe” label. Not true.
- Question: Did you know that Tylenol (or acetaminophen) is one of the leading causes of drug overdose? People think, Tylenol is safe, but it’s a potent drug that wreaks havoc on your liver. It is also often laced in other drugs, giving your liver a double whammy.
- All these drugs are toxins that have to be processed through your liver. What if you overload it? Or mix and match things that shouldn’t go together? You could be causing untold damage.

Your Liver Is Your Engine

- Now let’s talk about why you eat 3 meals a day. It’s because you’re feeding your body’s engine.
- Would you ever think of putting bacon grease or alcohol into your car? It would muck up your engine big time. Yet you think nothing of putting them into your engine - and you still expect it to run at full capacity.
- Question: Did you know that the carbohydrates (French fries, burgers, etc.) you eat are turned into sugar and then turned into fats?
- Excess fats are stored in your liver leading to Fatty Liver Diseases . . .and then beyond to your belly and derriere.
- Fat accumulation in the liver can also cause cirrhosis, and eventually even liver cancer.

Consider Obesity

- You may not have thought that obesity is related to your liver. But in fact it is.
- Fact: 1 in 6 Americans has a fatty liver – a warning that your liver is in serious trouble.
- Women -- Are considered obese if the waist measure is more than 35 inches
Men -- Are considered obese if the waist measure is more than 40 inches
- It’s up to you to take charge of what you are feeding your engine.

What About Alcohol?

- Doctors tell us that your personal liver cells have the capability to processing the toxins in one drink a day for a woman and two drinks a day for a man.
- When I think of alcohol :
 - It reminds me of Hurricane Katrina in New Orleans
 - The levees were built to handle a hurricane - but when Katrina came along, it overwhelmed them and they were destroyed. It was absolutely devastating.

- Well when you start pouring a six pack of beer or a bottle of wine into your liver cells:
 - They TOO are overwhelmed and unable to remove ALL the toxins in the alcohol. This can cause liver cell damage and the overflow is poured back into your blood stream and carried to your brain.
- All this can happen without any warning that your poor old liver is in trouble. . .
 - That is until it is badly damaged. . . .and your power plant starts to shut down.

Absorb Through your Skin?

- We talked about eating, and drugs and alcohol – but what do we mean by “the liver processes what you absorb through your skin”?
- Your skin is your body’s first line of defense. It’s like a raincoat for your body. However, broken skin can take toxins on the express lane right to your liver.
- Think about tattoos and body piercings. Even if you think a place is reputable, you never know what sanitary precautions workers are or aren’t taking.
- **Same goes for manicures and pedicures.**
- **Quick Tip:** What is hepatitis? It is a dangerous virus that directly attacks your liver, and all it’s functions. You may have heard various versions of it: A,B,C,D,E?
 - **Here’s how to keep it straight:** the VOWELS are found in the BOWELS–A & E
 - Everything else is found in blood – Consider food preparation, sharing needles, touching other people’s blood. All have the potential to infect you with hepatitis.

Breathing in Toxins

- We’ve heard time and time again that breathing in smoke is bad for your lungs, but it is also bad for your liver.
- The toxins in smog, pollutants, disinfectants, and even bug spray have to be refined by your liver. Overwhelming your liver can take it that much more susceptible to damage.

Wrap Up

- What are the takeaways of today?
 1. Your liver is your body’s internal chemical power plant. It’s liver cells act as the employees, processing everything you eat, breath, and absorb through your skin.
 2. The liver’s functions, aid in digestion, absorption of nutrients, filtration of toxins, production of immune and clotting factors, and more.
 3. Liver cell death, is call cirrhosis.
 4. Your liver is a non-complaining organ. It can’t warn you of trouble until the damage is already far advanced.
 5. It is up to you to take care of your liver by feeding it good foods, avoiding risky behaviors, and getting vaccinated against hepatitis viruses.