WEBVTT

NOTE duration: "01:09:29.3230000"

NOTE language:en-us

NOTE Confidence: 0.857298

 $00{:}00{:}00{:}00{.}000 \dashrightarrow 00{:}01.855$ Here with us today I see a

NOTE Confidence: 0.857298

 $00:00:01.855 \longrightarrow 00:00:03.559$ lot of friends on this call,

NOTE Confidence: 0.857298

 $00:00:03.560 \longrightarrow 00:00:05.126$ so I'm super excited that you

NOTE Confidence: 0.857298

00:00:05.126 --> 00:00:07.068 all join us on the Snowy day.

NOTE Confidence: 0.857298

 $00:00:07.070 \longrightarrow 00:00:09.230$ I guess that's the benefit of kovit instead,

NOTE Confidence: 0.857298

 $00:00:09.230 \longrightarrow 00:00:10.814$ so we don't have to worry

NOTE Confidence: 0.857298

 $00{:}00{:}10.814 \longrightarrow 00{:}00{:}12.200$ about canceling of the snow.

NOTE Confidence: 0.857298

 $00:00:12.200 \longrightarrow 00:00:12.738$ Nothing changes.

NOTE Confidence: 0.857298

00:00:12.738 --> 00:00:13.814 Everything is exactly the

NOTE Confidence: 0.857298

 $00:00:13.814 \longrightarrow 00:00:15.170$ same as my kids were.

NOTE Confidence: 0.857298

 $00{:}00{:}15.170 \dashrightarrow 00{:}00{:}16.511$ Disappointed that there's

NOTE Confidence: 0.857298

 $00{:}00{:}16.511 \dashrightarrow 00{:}00{:}19.193$ not gonna be a snow day.

NOTE Confidence: 0.857298

 $00:00:19.200 \longrightarrow 00:00:20.856$ So I'm Elena Ratner.

NOTE Confidence: 0.857298

 $00{:}00{:}20.856 \dashrightarrow 00{:}00{:}22.914$ I wanted the Joanne on cologists

 $00{:}00{:}22.914 \dashrightarrow 00{:}00{:}25.398$ and Gloria Wong is with us.

NOTE Confidence: 0.857298

 $00{:}00{:}25.400 \dashrightarrow 00{:}00{:}28.256$ Who is one of my colleagues and

NOTE Confidence: 0.857298

00:00:28.256 --> 00:00:29.970 associate professor of join

NOTE Confidence: 0.857298

00:00:29.970 --> 00:00:32.045 ecology at Yale University and

NOTE Confidence: 0.857298

 $00:00:32.045 \longrightarrow 00:00:34.586$ we provide care all through the

NOTE Confidence: 0.857298

 $00:00:34.586 \longrightarrow 00:00:36.586$ state of Connecticut all the

NOTE Confidence: 0.857298

 $00:00:36.586 \longrightarrow 00:00:39.023$ way from New Haven to granich.

NOTE Confidence: 0.857298

 $00:00:39.023 \longrightarrow 00:00:40.256$ And that's wrong.

NOTE Confidence: 0.857298

 $00:00:40.260 \longrightarrow 00:00:42.300$ Actually now provides care in

NOTE Confidence: 0.857298

 $00:00:42.300 \longrightarrow 00:00:44.811$ Greenwich Full Time which were super

NOTE Confidence: 0.857298

00:00:44.811 --> 00:00:47.181 super excited about and that could

NOTE Confidence: 0.857298

 $00{:}00{:}47.181 \dashrightarrow 00{:}00{:}50.171$ then yellow addio who's with us was

NOTE Confidence: 0.857298

 $00{:}00{:}50.171 \dashrightarrow 00{:}00{:}51.907$ an amazing radiation on cologists.

NOTE Confidence: 0.857298

00:00:51.910 --> 00:00:53.181 In the Greenwich community,

NOTE Confidence: 0.857298

 $00:00:53.181 \longrightarrow 00:00:55.396$ and we're so excited that you're here

 $00:00:55.396 \longrightarrow 00:00:57.618$ with us today to talk about chemical

NOTE Confidence: 0.857298

 $00:00:57.618 \longrightarrow 00:00:59.526$ logic answers and what has changed

NOTE Confidence: 0.857298

 $00:00:59.526 \longrightarrow 00:01:01.418$ in the management of these cancers.

NOTE Confidence: 0.857298

 $00:01:01.420 \longrightarrow 00:01:03.010$ And this is very informal.

NOTE Confidence: 0.857298

 $00:01:03.010 \longrightarrow 00:01:04.978$ So as you ladies have questions

NOTE Confidence: 0.857298

00:01:04.978 --> 00:01:06.809 that you would like to ask,

NOTE Confidence: 0.857298

 $00:01:06.810 \longrightarrow 00:01:08.889$ please put them in the chat and

NOTE Confidence: 0.857298

00:01:08.889 --> 00:01:11.223 I will be watching the chat and

NOTE Confidence: 0.857298

 $00{:}01{:}11.223 \dashrightarrow 00{:}01{:}13.780$ we can talk about them as we go.

NOTE Confidence: 0.857298

00:01:13.780 --> 00:01:15.670 Otherwise will start back along if

NOTE Confidence: 0.857298

 $00{:}01{:}15.670 \dashrightarrow 00{:}01{:}18.007$ you would like to start talking a

NOTE Confidence: 0.857298

 $00:01:18.007 \longrightarrow 00:01:20.041$ little bit about early detection and

NOTE Confidence: 0.857298

 $00:01:20.041 \longrightarrow 00:01:21.863$ the advances that we've made and

NOTE Confidence: 0.857298

 $00:01:21.863 \longrightarrow 00:01:24.112$ then I will add to your presentation.

NOTE Confidence: 0.857298

 $00:01:24.112 \longrightarrow 00:01:25.756$ And then that area.

NOTE Confidence: 0.857298

00:01:25.760 --> 00:01:26.918 If that's OK,

 $00:01:26.920 \longrightarrow 00:01:28.460$ we will have actually,

NOTE Confidence: 0.8535068

 $00:01:28.460 \longrightarrow 00:01:30.770$ because radiation it's a little bit.

NOTE Confidence: 0.8535068

 $00:01:30.770 \longrightarrow 00:01:31.540$ Probably not.

NOTE Confidence: 0.8535068

00:01:31.540 --> 00:01:33.850 People don't know so much about,

NOTE Confidence: 0.8535068

 $00:01:33.850 \longrightarrow 00:01:36.154$ so I have like a PowerPoint

NOTE Confidence: 0.8535068

 $00:01:36.154 \longrightarrow 00:01:37.700$ with some slides. OK,

NOTE Confidence: 0.8535068

 $00:01:37.700 \longrightarrow 00:01:38.855$ wonderful, that's great.

NOTE Confidence: 0.8535068

 $00:01:38.855 \longrightarrow 00:01:40.780$ So will perceive like that.

NOTE Confidence: 0.8535068

 $00:01:40.780 \longrightarrow 00:01:42.826$ So that's a long wonderful thank

NOTE Confidence: 0.8535068

 $00:01:42.826 \longrightarrow 00:01:45.399$ you so much for the introduction

NOTE Confidence: 0.8535068

 $00:01:45.400 \dashrightarrow 00:01:48.862$ Doctor Ratner and hello to all of our guests.

NOTE Confidence: 0.8535068

 $00:01:48.862 \longrightarrow 00:01:52.330$ And thank you so much for joining us today.

NOTE Confidence: 0.8535068

00:01:52.330 --> 00:01:54.330 I actually made some up

NOTE Confidence: 0.8535068

 $00{:}01{:}54.330 \dashrightarrow 00{:}01{:}55.930$ PowerPoint pictures as well.

NOTE Confidence: 0.8535068

 $00:01:55.930 \longrightarrow 00:01:57.934$ So I will try to share

 $00:01:57.934 \longrightarrow 00:01:59.660$ those and get started now.

NOTE Confidence: 0.8535068

00:01:59.660 --> 00:02:01.739 So let me just go ahead and

NOTE Confidence: 0.8535068

 $00:02:01.739 \longrightarrow 00:02:03.729$ just do my screen share.

NOTE Confidence: 0.89763665

 $00:02:18.060 \longrightarrow 00:02:21.673$ So I'm happy to talk about recent advances

NOTE Confidence: 0.89763665

 $00:02:21.673 \longrightarrow 00:02:23.477$ in gynecological cancer prevention,

NOTE Confidence: 0.89763665

 $00:02:23.480 \longrightarrow 00:02:25.740$ early detection and treatment today.

NOTE Confidence: 0.8093594

 $00:02:29.500 \longrightarrow 00:02:31.828$ To review what we're talking

NOTE Confidence: 0.8093594

 $00:02:31.828 \longrightarrow 00:02:33.226$ about gynecological cancers.

NOTE Confidence: 0.8093594

 $00:02:33.230 \longrightarrow 00:02:36.026$ These are cancers that arise from

NOTE Confidence: 0.8093594

00:02:36.026 --> 00:02:37.890 the female reproductive system,

NOTE Confidence: 0.8093594

00:02:37.890 --> 00:02:40.674 with the most common being uterine

NOTE Confidence: 0.8093594

 $00:02:40.674 \longrightarrow 00:02:43.010$ cancer arising from the womb.

NOTE Confidence: 0.8093594

00:02:43.010 --> 00:02:46.279 Most often, the lining of the uterus,

NOTE Confidence: 0.8093594

00:02:46.280 --> 00:02:48.610 called the endometrium ovarian cancer,

NOTE Confidence: 0.8093594

 $00:02:48.610 \longrightarrow 00:02:50.008$ which actually encompases,

NOTE Confidence: 0.8093594

00:02:50.008 --> 00:02:50.940 ovarian, fallopian,

 $00:02:50.940 \longrightarrow 00:02:52.335$ and peritoneal cancer,

NOTE Confidence: 0.8093594

 $00:02:52.335 \longrightarrow 00:02:54.195$ and then cervical cancer,

NOTE Confidence: 0.8093594

 $00:02:54.200 \longrightarrow 00:02:56.600$ which arises from the neck.

NOTE Confidence: 0.8093594

 $00:02:56.600 \longrightarrow 00:02:59.554$ Or opening of the of the womb.

NOTE Confidence: 0.8093594

 $00:02:59.560 \longrightarrow 00:03:01.675$ These are the three most

NOTE Confidence: 0.8093594

 $00{:}03{:}01.675 \dashrightarrow 00{:}03{:}03.790$ common types of ginj cancer.

NOTE Confidence: 0.8655089

 $00:03:05.840 \longrightarrow 00:03:08.640$ See if I can advance here.

NOTE Confidence: 0.8655089

 $00:03:08.640 \longrightarrow 00:03:11.448$ Just how common are these cancers?

NOTE Confidence: 0.8655089

 $00:03:11.450 \longrightarrow 00:03:14.348$ Uterine cancer is the most common in

NOTE Confidence: 0.8655089

 $00:03:14.348 \dashrightarrow 00:03:18.953$ about 1 in 35 women in the US will receive

NOTE Confidence: 0.8655089

00:03:18.953 --> 00:03:21.769 this diagnosis during their lifetime.

NOTE Confidence: 0.8655089

 $00{:}03{:}21.770 \dashrightarrow 00{:}03{:}24.374$ Ovarian cancer is the second most

NOTE Confidence: 0.8655089

 $00:03:24.374 \longrightarrow 00:03:27.223$ common with about one and 70

NOTE Confidence: 0.8655089

00:03:27.223 --> 00:03:29.275 women developing ovarian cancer,

NOTE Confidence: 0.8655089

 $00:03:29.280 \longrightarrow 00:03:32.776$ and cervical cancer is less common now due

 $00:03:32.776 \longrightarrow 00:03:35.837$ to improvements in prevention and detection.

NOTE Confidence: 0.8655089

 $00:03:35.840 \longrightarrow 00:03:38.552$ With about 160 women

NOTE Confidence: 0.8655089

 $00:03:38.552 \longrightarrow 00:03:40.586$ developing cervical cancer.

NOTE Confidence: 0.8655089

00:03:40.590 --> 00:03:42.876 Cervical cancer is a great example

NOTE Confidence: 0.8655089

00:03:42.876 --> 00:03:46.112 of how far we have advanced in

NOTE Confidence: 0.8655089

00:03:46.112 --> 00:03:48.288 prevention and early detection,

NOTE Confidence: 0.8655089

 $00:03:48.290 \longrightarrow 00:03:51.485$ so we are able to prevent the vast majority

NOTE Confidence: 0.8655089

 $00:03:51.485 \longrightarrow 00:03:55.087$ of cervical cancers through HPV vaccination.

NOTE Confidence: 0.8655089

00:03:55.090 --> 00:03:56.365 And in addition,

NOTE Confidence: 0.8655089

 $00:03:56.365 \longrightarrow 00:03:58.915$ we have met modalities of early

NOTE Confidence: 0.8655089

00:03:58.915 --> 00:04:00.519 detection using cytology,

NOTE Confidence: 0.8655089

00:04:00.520 --> 00:04:04.048 most commonly known as Pap test

NOTE Confidence: 0.8655089

 $00:04:04.048 \longrightarrow 00:04:05.812$ and HPV testing.

NOTE Confidence: 0.8655089

 $00:04:05.820 \longrightarrow 00:04:09.018$ So the vast majority of cervical

NOTE Confidence: 0.8655089

 $00:04:09.018 \longrightarrow 00:04:11.650$ cancers are caused by HPV,

NOTE Confidence: 0.8655089

 $00{:}04{:}11.650 \dashrightarrow 00{:}04{:}13.240$ human papilloma papilloma

00:04:13.240 --> 00:04:15.360 virus infection with HPV,

NOTE Confidence: 0.8655089

 $00:04:15.360 \longrightarrow 00:04:17.480$ infection rates historically have

NOTE Confidence: 0.8655089

 $00:04:17.480 \longrightarrow 00:04:21.720$ been most adults about 85% or more of

NOTE Confidence: 0.8655089

00:04:21.720 --> 00:04:24.900 adults having been infected by HPV,

NOTE Confidence: 0.8655089

 $00:04:24.900 \longrightarrow 00:04:28.134$ and usually our immune system clears the

NOTE Confidence: 0.8655089

 $00:04:28.134 \longrightarrow 00:04:31.788$ infection and no further sequelae developed.

NOTE Confidence: 0.8655089

00:04:31.790 --> 00:04:32.320 However,

NOTE Confidence: 0.8655089

 $00:04:32.320 \longrightarrow 00:04:34.970$ in some women and men,

NOTE Confidence: 0.8655089

00:04:34.970 --> 00:04:37.690 persistent HPV infection can develop.

NOTE Confidence: 0.8655089

 $00:04:37.690 \longrightarrow 00:04:39.850$ Which actually can lead to the

NOTE Confidence: 0.8655089

 $00{:}04{:}39.850 \dashrightarrow 00{:}04{:}42.151$ virus genes becoming part of the

NOTE Confidence: 0.8655089

00:04:42.151 --> 00:04:43.735 cell's DNA called integration,

NOTE Confidence: 0.8655089

 $00:04:43.740 \longrightarrow 00:04:46.169$ and that is the type of HPV

NOTE Confidence: 0.8655089

 $00:04:46.169 \longrightarrow 00:04:48.520$ infection that can lead to pre

NOTE Confidence: 0.8655089

 $00:04:48.520 \longrightarrow 00:04:50.160$ cancer and cancer lesions.

 $00:04:52.980 \longrightarrow 00:04:56.076$ As I said, we are lucky enough to have

NOTE Confidence: 0.85790277

 $00{:}04{:}56.076 \dashrightarrow 00{:}04{:}58.303$ cancer prevention for cervical cancer

NOTE Confidence: 0.85790277

 $00:04:58.303 \longrightarrow 00:05:01.700$ and that consists of the HPV vaccine,

NOTE Confidence: 0.85790277

 $00:05:01.700 \longrightarrow 00:05:05.020$ which in this country is the Gardasil 9.

NOTE Confidence: 0.85790277

 $00:05:05.020 \longrightarrow 00:05:07.090$ Not only does this prevent

NOTE Confidence: 0.85790277

 $00:05:07.090 \longrightarrow 00:05:09.813$ over 90% of cervical cancer,

NOTE Confidence: 0.85790277

 $00:05:09.813 \longrightarrow 00:05:12.968$ but five additional cancers are.

NOTE Confidence: 0.85790277

00:05:12.970 --> 00:05:15.175 Related to HPV infection in

NOTE Confidence: 0.85790277

 $00{:}05{:}15.175 \dashrightarrow 00{:}05{:}16.939$ these include oral pharyngeal,

NOTE Confidence: 0.85790277

00:05:16.940 --> 00:05:19.581 which is throat cancer, **** cancer,

NOTE Confidence: 0.85790277

00:05:19.581 --> 00:05:21.786 vulva, ***** and vagina cancer.

NOTE Confidence: 0.85790277

 $00:05:21.790 \longrightarrow 00:05:24.562$ So these vaccines work the best

NOTE Confidence: 0.85790277

 $00:05:24.562 \longrightarrow 00:05:27.960$ when they are given at an early age,

NOTE Confidence: 0.85790277

 $00:05:27.960 \longrightarrow 00:05:31.040$ usually around age 11 or 12 is the

NOTE Confidence: 0.85790277

 $00:05:31.040 \longrightarrow 00:05:33.745$ ideal time and in younger patients

NOTE Confidence: 0.85790277

 $00{:}05{:}33.745 \dashrightarrow 00{:}05{:}36.517$ only two vaccine two shots are

 $00{:}05{:}36.605 \dashrightarrow 00{:}05{:}39.425$ needed in older teens and adults.

NOTE Confidence: 0.85790277

 $00{:}05{:}39.430 \to 00{:}05{:}42.517$ Three shots are needed to have good.

NOTE Confidence: 0.85790277

 $00:05:42.520 \longrightarrow 00:05:44.280$ A good preventive effect.

NOTE Confidence: 0.852958

 $00:05:46.430 \longrightarrow 00:05:49.699$ Screening is has evolved over the years,

NOTE Confidence: 0.852958

 $00{:}05{:}49.700 \dashrightarrow 00{:}05{:}53.108$ and screening is still done for women who

NOTE Confidence: 0.852958

 $00:05:53.108 \longrightarrow 00:05:56.699$ have and have not received the vaccines.

NOTE Confidence: 0.852958

00:05:56.700 --> 00:05:59.556 However, in order to kind of reduce

NOTE Confidence: 0.852958

 $00:05:59.556 \longrightarrow 00:06:01.936$ the invasiveness of screening and

NOTE Confidence: 0.852958

 $00:06:01.936 \longrightarrow 00:06:04.636$ reduce tests and invasive procedures,

NOTE Confidence: 0.852958

 $00:06:04.640 \longrightarrow 00:06:08.376$ we now start screening at an older age.

NOTE Confidence: 0.852958

 $00:06:08.380 \longrightarrow 00:06:12.097$ So 21 and up and also we have longer

NOTE Confidence: 0.852958

 $00:06:12.097 \longrightarrow 00:06:15.479$ screening intervals for low risk patients.

NOTE Confidence: 0.852958

 $00{:}06{:}15.480 \dashrightarrow 00{:}06{:}17.390$ So while previously patients were

NOTE Confidence: 0.852958

 $00:06:17.390 \longrightarrow 00:06:20.652$ going every year for a PAP Now we

NOTE Confidence: 0.852958

 $00:06:20.652 \longrightarrow 00:06:22.364$ still recommends Wellness visits.

 $00:06:22.370 \longrightarrow 00:06:25.002$ However, the actual PAP and HPV tests

NOTE Confidence: 0.852958

 $00:06:25.002 \longrightarrow 00:06:28.244$ can be spaced at an interval of three to

NOTE Confidence: 0.852958

 $00:06:28.244 \longrightarrow 00:06:30.715$ five years and then also discontinuing

NOTE Confidence: 0.852958

00:06:30.715 --> 00:06:33.300 screening in patients at very,

NOTE Confidence: 0.852958

 $00:06:33.300 \longrightarrow 00:06:36.149$ very low risks such as those who've

NOTE Confidence: 0.852958

 $00:06:36.149 \longrightarrow 00:06:39.019$ had a hysterectomy with removal of the

NOTE Confidence: 0.852958

 $00:06:39.019 \longrightarrow 00:06:41.850$ cervix not related to pre cancer or

NOTE Confidence: 0.852958

00:06:41.850 --> 00:06:44.250 elderly women who've had many negative

NOTE Confidence: 0.852958

 $00{:}06{:}44.250 \dashrightarrow 00{:}06{:}46.998$ paps and no history of pre cancers.

NOTE Confidence: 0.852958

 $00:06:46.998 \longrightarrow 00:06:49.856$ Just a caveat that these are general

NOTE Confidence: 0.852958

 $00{:}06{:}49.856 \dashrightarrow 00{:}06{:}52.161$ guidelines for lowers patients and

NOTE Confidence: 0.852958

00:06:52.161 --> 00:06:54.945 don't apply to high risk patients

NOTE Confidence: 0.852958

 $00:06:54.945 \longrightarrow 00:06:57.531$ so high risk patients are patients

NOTE Confidence: 0.852958

 $00:06:57.531 \longrightarrow 00:06:59.576$ who might have immunosuppression

NOTE Confidence: 0.852958

00:06:59.576 --> 00:07:03.104 or have had history of persistent

NOTE Confidence: 0.852958

 $00:07:03.104 --> 00:07:05.540 \; \mathrm{HPV}$ in fection or pre cancer.

 $00:07:05.540 \longrightarrow 00:07:07.770$ In terms of future directions,

NOTE Confidence: 0.852958

 $00:07:07.770 \longrightarrow 00:07:10.746$ an alternative has evolved which is

NOTE Confidence: 0.852958

 $00:07:10.746 \longrightarrow 00:07:13.186$ primary HPV screening with types

NOTE Confidence: 0.852958

00:07:13.186 --> 00:07:16.194 typing of the HPV and we'll see this

NOTE Confidence: 0.852958

 $00:07:16.194 \longrightarrow 00:07:18.890$ more and more with HPV screening,

NOTE Confidence: 0.852958

 $00{:}07{:}18.890 \dashrightarrow 00{:}07{:}21.914$ typing and then determining what if

NOTE Confidence: 0.852958

 $00:07:21.914 \longrightarrow 00:07:25.190$ anything needs to be done further.

NOTE Confidence: 0.852958

 $00:07:25.190 \longrightarrow 00:07:27.774$ I am so proud to say that Connecticut

NOTE Confidence: 0.852958

 $00:07:27.774 \longrightarrow 00:07:31.188$ is a national leader in HPV vaccination.

NOTE Confidence: 0.852958

 $00{:}07{:}31.190 \dashrightarrow 00{:}07{:}33.360$ So while the United States as a

NOTE Confidence: 0.852958

 $00:07:33.360 \longrightarrow 00:07:35.399$ whole has lagged vaccination rates

NOTE Confidence: 0.852958

 $00:07:35.399 \longrightarrow 00:07:37.989$ compared to other developed countries,

NOTE Confidence: 0.852958

 $00{:}07{:}37.990 \dashrightarrow 00{:}07{:}40.295$ actually Connecticut over 50% of

NOTE Confidence: 0.852958

 $00:07:40.295 \longrightarrow 00:07:42.600$ eligible women have been vaccinated

NOTE Confidence: 0.852958

 $00:07:42.672 \longrightarrow 00:07:44.616$ and this is directly related to

00:07:44.616 --> 00:07:46.805 about a 50% decrease in cervical

NOTE Confidence: 0.852958

 $00{:}07{:}46.805 \dashrightarrow 00{:}07{:}48.830$ cancer deaths since the introduction

NOTE Confidence: 0.852958

 $00:07:48.830 \longrightarrow 00:07:50.789$ of HPV vaccines in 2006.

NOTE Confidence: 0.852958

 $00:07:50.790 \longrightarrow 00:07:55.116$ So really it is a success story.

NOTE Confidence: 0.852958

00:07:55.120 --> 00:07:58.304 Now we still see about 12,000 patients per

NOTE Confidence: 0.852958

00:07:58.304 --> 00:08:01.978 year in the US who develop cervical cancer,

NOTE Confidence: 0.852958

 $00:08:01.980 \longrightarrow 00:08:03.270$ and we have,

NOTE Confidence: 0.852958

 $00:08:03.270 \longrightarrow 00:08:05.850$ in terms of recent treatment advances,

NOTE Confidence: 0.852958

 $00:08:05.850 \longrightarrow 00:08:07.990$ we can now offer individualized

NOTE Confidence: 0.852958

 $00:08:07.990 \longrightarrow 00:08:08.846$ surgical treatment.

NOTE Confidence: 0.852958

 $00{:}08{:}08.850 \dashrightarrow 00{:}08{:}11.418$ So when cervical cancer does develop,

NOTE Confidence: 0.852958

00:08:11.420 --> 00:08:15.272 it's often in women in their 30s and 40s,

NOTE Confidence: 0.852958

 $00:08:15.280 \longrightarrow 00:08:17.704$ for some of whom fertility sparing

NOTE Confidence: 0.852958

 $00:08:17.704 \longrightarrow 00:08:20.430$ to have a family is important,

NOTE Confidence: 0.852958

 $00:08:20.430 \longrightarrow 00:08:24.066$ so we do have the ability to offer fertility

NOTE Confidence: 0.852958

 $00{:}08{:}24.066 \dashrightarrow 00{:}08{:}26.966$ sparing surgery to preserve the uterus.

 $00:08:26.970 \longrightarrow 00:08:29.766$ And allow women to have families

NOTE Confidence: 0.852958

 $00:08:29.766 \longrightarrow 00:08:31.164$ in selected patients.

NOTE Confidence: 0.852958

 $00:08:31.170 \longrightarrow 00:08:32.052$ In addition,

NOTE Confidence: 0.852958

 $00:08:32.052 \longrightarrow 00:08:34.698$ another big advance for patients who

NOTE Confidence: 0.852958

 $00:08:34.698 \longrightarrow 00:08:37.020$ have recurrent or metastatic cancer

NOTE Confidence: 0.852958

 $00:08:37.020 \longrightarrow 00:08:39.750$ is being able to offer patients

NOTE Confidence: 0.852958

00:08:39.750 --> 00:08:41.449 immunotherapy when appropriate,

NOTE Confidence: 0.852958

 $00:08:41.450 \longrightarrow 00:08:44.719$ which really has improved outcomes as well.

NOTE Confidence: 0.84214723

00:08:47.970 --> 00:08:50.196 In contrast to cervical cancer,

NOTE Confidence: 0.84214723

00:08:50.196 --> 00:08:52.426 where we have declining rates,

NOTE Confidence: 0.84214723

 $00:08:52.430 \longrightarrow 00:08:53.768$ endometrial cancer rates

NOTE Confidence: 0.84214723

 $00:08:53.768 \longrightarrow 00:08:55.106$ are actually increasing,

NOTE Confidence: 0.84214723

 $00{:}08{:}55.110 \dashrightarrow 00{:}08{:}57.917$ so there is year over year increases

NOTE Confidence: 0.84214723

00:08:57.917 --> 00:09:01.164 in the number of cases and deaths

NOTE Confidence: 0.84214723

 $00:09:01.164 \longrightarrow 00:09:03.576$ from endometrial cancer every year.

 $00:09:03.576 \longrightarrow 00:09:05.805$ And this is partly related

NOTE Confidence: 0.84214723

 $00{:}09{:}05.805 \dashrightarrow 00{:}09{:}07.585$ to the obesity epidemic.

NOTE Confidence: 0.84214723

 $00:09:07.590 \longrightarrow 00:09:09.820$ Over 90% of endometrial cancer

NOTE Confidence: 0.84214723

 $00:09:09.820 \longrightarrow 00:09:12.492$ is obesity related, so in part,

NOTE Confidence: 0.84214723

 $00:09:12.492 \longrightarrow 00:09:14.712$ related to obesity and related

NOTE Confidence: 0.84214723

 $00:09:14.712 \longrightarrow 00:09:16.599$ conditions such as diabetes.

NOTE Confidence: 0.84214723

00:09:16.600 --> 00:09:19.590 An increased insulin levels about

NOTE Confidence: 0.84214723

 $00:09:19.590 \longrightarrow 00:09:21.9905\%$ are genetically related,

NOTE Confidence: 0.84214723

 $00{:}09{:}21.990 --> 00{:}09{:}24.390$ such as Lynch syndrome,

NOTE Confidence: 0.84214723

 $00:09:24.390 \longrightarrow 00:09:29.230$ and then there can be other factors such

NOTE Confidence: 0.84214723

 $00{:}09{:}29.230 \dashrightarrow 00{:}09{:}33.068$ as unopposed estrogen or tamoxifen.

NOTE Confidence: 0.84214723

 $00:09:33.070 \longrightarrow 00:09:36.726$ So we have good ways to lower endometrial

NOTE Confidence: 0.84214723

 $00{:}09{:}36.726 \dashrightarrow 00{:}09{:}38.640$ CanSAR endometrial cancer risk.

NOTE Confidence: 0.84214723

00:09:38.640 --> 00:09:40.280 And these include maintaining

NOTE Confidence: 0.84214723

 $00:09:40.280 \longrightarrow 00:09:41.510$ a healthy weight.

NOTE Confidence: 0.84214723

00:09:41.510 --> 00:09:44.790 Exercising five are made more days of year,

 $00:09:44.790 \longrightarrow 00:09:46.950$ and we know that taking oral

NOTE Confidence: 0.84214723

 $00{:}09{:}46.950 \dashrightarrow 00{:}09{:}48.910$ contraceptives or using a Marina

NOTE Confidence: 0.84214723

 $00{:}09{:}48.910 \dashrightarrow 00{:}09{:}51.175$ progesterone IUD can be helpful

NOTE Confidence: 0.84214723

00:09:51.175 --> 00:09:52.987 for reducing long-term risks.

NOTE Confidence: 0.84214723

 $00{:}09{:}52.990 \dashrightarrow 00{:}09{:}55.040$ Long term avoiding unopposed estrogen.

NOTE Confidence: 0.84214723

 $00:09:55.040 \longrightarrow 00:09:57.910$ If you have a uterus and really

NOTE Confidence: 0.84214723

 $00:09:57.910 \longrightarrow 00:09:59.995$ to be aware of what?

NOTE Confidence: 0.84214723

 $00:09:59.995 \longrightarrow 00:10:00.885$ Warning signs,

NOTE Confidence: 0.84214723

 $00:10:00.885 \longrightarrow 00:10:03.555$ so any bleeding or spotting after

NOTE Confidence: 0.84214723

 $00:10:03.555 \longrightarrow 00:10:06.053$ menopause is abnormal and should

NOTE Confidence: 0.84214723

 $00:10:06.053 \longrightarrow 00:10:08.033$ prompt a gynecological evaluation.

NOTE Confidence: 0.81352216

 $00:10:10.690 \longrightarrow 00:10:13.234$ And we know how how Lynch

NOTE Confidence: 0.81352216

00:10:13.234 --> 00:10:15.420 syndrome can impact cancer risk,

NOTE Confidence: 0.81352216

 $00{:}10{:}15.420 \dashrightarrow 00{:}10{:}17.808$ including risk of colon cancer and

NOTE Confidence: 0.81352216

00:10:17.808 --> 00:10:20.580 a mutual cancer and ovarian cancer.

 $00:10:20.580 \longrightarrow 00:10:22.440$ So patients who women who

NOTE Confidence: 0.81352216

 $00{:}10{:}22.440 {\:{\circ}{\circ}{\circ}}>00{:}10{:}24.300$ have Lynch syndrome should be

NOTE Confidence: 0.81352216

00:10:24.368 --> 00:10:26.600 followed with enhanced screening,

NOTE Confidence: 0.81352216

 $00:10:26.600 \longrightarrow 00:10:28.320$ cancer screening for endometrial

NOTE Confidence: 0.81352216

 $00:10:28.320 \longrightarrow 00:10:30.040$ cancer can include exams,

NOTE Confidence: 0.81352216

00:10:30.040 --> 00:10:31.752 ultrasounds and endometrial biopsies,

NOTE Confidence: 0.81352216

 $00{:}10{:}31.752 \dashrightarrow 00{:}10{:}34.891$ and then we can offer women with

NOTE Confidence: 0.81352216

00:10:34.891 --> 00:10:37.396 Lynch syndrome risk reducing surgery

NOTE Confidence: 0.81352216

00:10:37.396 --> 00:10:39.820 usually consisting of hysterectomy and

NOTE Confidence: 0.81352216

 $00:10:39.820 \longrightarrow 00:10:42.298$ removal of the tubes and ovaries after.

NOTE Confidence: 0.81352216

 $00:10:42.300 \longrightarrow 00:10:43.707$ Childbearing is completed.

NOTE Confidence: 0.81352216

 $00:10:43.707 \longrightarrow 00:10:46.052$ I also wanted to highlight

NOTE Confidence: 0.81352216

 $00:10:46.052 \longrightarrow 00:10:48.456$ recent advances in the surgical

NOTE Confidence: 0.81352216

 $00:10:48.456 \longrightarrow 00:10:50.320$ treatment of endometrial cancer.

NOTE Confidence: 0.81352216

 $00:10:50.320 \longrightarrow 00:10:53.225$ So over the past decades we have

NOTE Confidence: 0.81352216

 $00{:}10{:}53.225 \dashrightarrow 00{:}10{:}56.458$ really moved to to the point where

 $00:10:56.458 \longrightarrow 00:10:59.308$ almost all of our endometrial cancer

NOTE Confidence: 0.81352216

 $00{:}10{:}59.401 \dashrightarrow 00{:}11{:}02.125$ patients are being treated in

NOTE Confidence: 0.81352216

00:11:02.125 --> 00:11:04.013 minimally invasive surgical approaches

NOTE Confidence: 0.81352216

00:11:04.013 --> 00:11:06.368 laparoscopically and or robotic assisted,

NOTE Confidence: 0.81352216

 $00:11:06.370 \longrightarrow 00:11:09.422$ and this offers short recovery times and

NOTE Confidence: 0.81352216

 $00:11:09.422 \longrightarrow 00:11:12.040$ quick resumption to usual activities.

NOTE Confidence: 0.81352216

 $00:11:12.040 \longrightarrow 00:11:13.160$ And really.

NOTE Confidence: 0.81352216

 $00:11:13.160 \longrightarrow 00:11:15.960$ Decreases the morbidity of an

NOTE Confidence: 0.81352216

00:11:15.960 --> 00:11:17.640 endometrial cancer diagnosis.

NOTE Confidence: 0.81352216

 $00:11:17.640 \longrightarrow 00:11:20.240$ An in fact, often less,

NOTE Confidence: 0.81352216

 $00:11:20.240 \longrightarrow 00:11:21.138$ is more,

NOTE Confidence: 0.81352216

 $00{:}11{:}21.138 \dashrightarrow 00{:}11{:}23.832$ and this is illustrated by selective

NOTE Confidence: 0.81352216

 $00{:}11{:}23.832 \dashrightarrow 00{:}11{:}26.613$ lymph node evaluation with procedures

NOTE Confidence: 0.81352216

00:11:26.613 --> 00:11:29.618 such as Sentinel node evaluation,

NOTE Confidence: 0.81352216

 $00:11:29.620 \longrightarrow 00:11:32.920$ which can be very sensitive for

 $00:11:32.920 \longrightarrow 00:11:35.917$ detecting disease outside the uterus

NOTE Confidence: 0.81352216

 $00{:}11{:}35.917 \dashrightarrow 00{:}11{:}39.447$ while decreasing potential side effects.

NOTE Confidence: 0.81352216

 $00{:}11{:}39.450 \dashrightarrow 00{:}11{:}42.138$ I also wanted to highlight that

NOTE Confidence: 0.81352216

 $00:11:42.138 \longrightarrow 00:11:44.862$ endometrial cancer we really have moved

NOTE Confidence: 0.81352216

00:11:44.862 --> 00:11:47.830 into the area era of precision medicine,

NOTE Confidence: 0.81352216

 $00:11:47.830 \longrightarrow 00:11:50.195$ so we currently perform molecular

NOTE Confidence: 0.81352216

 $00{:}11{:}50.195 \dashrightarrow 00{:}11{:}52.560$ testing on all endometrial cancers

NOTE Confidence: 0.81352216

 $00:11:52.636 \longrightarrow 00:11:54.850$ to detect protein changes in the

NOTE Confidence: 0.81352216

 $00:11:54.850 \longrightarrow 00:11:57.351$ tumor cells that can indicate a

NOTE Confidence: 0.81352216

00:11:57.351 --> 00:11:59.736 potential presence of Lynch syndrome,

NOTE Confidence: 0.81352216

 $00:11:59.740 \longrightarrow 00:12:01.940$ an also these protein changes,

NOTE Confidence: 0.81352216

00:12:01.940 --> 00:12:03.515 called Immunohistochemical Street,

NOTE Confidence: 0.81352216

 $00:12:03.515 \longrightarrow 00:12:07.190$ can guide our treatment decisions as well.

NOTE Confidence: 0.81352216

00:12:07.190 --> 00:12:08.040 In addition,

NOTE Confidence: 0.81352216

 $00:12:08.040 \longrightarrow 00:12:09.740$ immunotherapy is available for

NOTE Confidence: 0.81352216

 $00:12:09.740 \longrightarrow 00:12:11.878$ most patients with recurrent or

00:12:11.878 --> 00:12:13.390 advanced in Dimitriou cancer,

NOTE Confidence: 0.81352216

 $00:12:13.390 \longrightarrow 00:12:16.694$ and in fact we have a number of

NOTE Confidence: 0.81352216

 $00:12:16.694 \longrightarrow 00:12:18.748$ clinical trials on going now.

NOTE Confidence: 0.81352216

 $00:12:18.750 \longrightarrow 00:12:20.875$ Also looking at immunotherapy in

NOTE Confidence: 0.81352216

 $00:12:20.875 \longrightarrow 00:12:23.000$ the frontline setting for patients

NOTE Confidence: 0.81352216

 $00:12:23.072 \longrightarrow 00:12:25.358$ with higher risk into mutual cancer.

NOTE Confidence: 0.81352216

 $00:12:25.360 \longrightarrow 00:12:27.478$ We also are actively investigating the

NOTE Confidence: 0.81352216

00:12:27.478 --> 00:12:30.729 how we can best deploy endocrine therapies,

NOTE Confidence: 0.81352216

00:12:30.730 --> 00:12:32.800 hormone therapies Brenda Mitchell Cancer,

NOTE Confidence: 0.81352216

 $00:12:32.800 \longrightarrow 00:12:35.264$ which as you know are very much

NOTE Confidence: 0.81352216

 $00:12:35.264 \longrightarrow 00:12:37.500$ the mainstay of breast cancer

NOTE Confidence: 0.81352216

 $00{:}12{:}37.500 \dashrightarrow 00{:}12{:}39.700$ and prostate cancer treatment.

NOTE Confidence: 0.81352216

 $00{:}12{:}39.700 \dashrightarrow 00{:}12{:}42.796$ A man are in our under active investigation.

NOTE Confidence: 0.81352216

 $00:12:42.800 \longrightarrow 00:12:43.580$ In fact,

NOTE Confidence: 0.81352216

 $00:12:43.580 \longrightarrow 00:12:45.530$ I'm leading set one such

00:12:45.530 --> 00:12:47.070 national trial right now,

NOTE Confidence: 0.81352216

 $00:12:47.070 \longrightarrow 00:12:48.622$ which hopefully will lead

NOTE Confidence: 0.81352216

 $00:12:48.622 \longrightarrow 00:12:50.174$ to some new therapy,

NOTE Confidence: 0.81352216

 $00:12:50.180 \longrightarrow 00:12:52.490$ ways to treat endometrial cancer and

NOTE Confidence: 0.81352216

 $00:12:52.490 \longrightarrow 00:12:55.878$ more and more you'll see that will be

NOTE Confidence: 0.81352216

 $00{:}12{:}55.878 \dashrightarrow 00{:}12{:}57.658$ incorporating targeted the rapies in

NOTE Confidence: 0.81352216

 $00:12:57.658 \longrightarrow 00:13:00.109$ the frontline and recurrent setting.

NOTE Confidence: 0.81352216

00:13:00.110 --> 00:13:02.270 In terms of endometrial cancer survivorship,

NOTE Confidence: 0.81352216

 $00:13:02.270 \longrightarrow 00:13:06.030$ this is such an important.

NOTE Confidence: 0.81352216

 $00:13:06.030 \longrightarrow 00:13:08.020$ Part of endometrial cancer care.

NOTE Confidence: 0.81352216

 $00:13:08.020 \longrightarrow 00:13:10.005$ Because we have excellent oncological

NOTE Confidence: 0.81352216

00:13:10.005 --> 00:13:11.593 outcomes in endometrial cancer.

NOTE Confidence: 0.81352216

00:13:11.600 --> 00:13:13.256 Very high cure rates,

NOTE Confidence: 0.81352216

 $00{:}13{:}13.256 \dashrightarrow 00{:}13{:}14.912$ especially in patients with

NOTE Confidence: 0.81352216

00:13:14.912 --> 00:13:17.167 early stage disease and in fact,

NOTE Confidence: 0.81352216

 $00{:}13{:}17.170 \dashrightarrow 00{:}13{:}19.255$ long-term follow-up shows that most

00:13:19.255 --> 00:13:21.340 engine mutual cancer patients are

NOTE Confidence: 0.81352216

 $00{:}13{:}21.407 \dashrightarrow 00{:}13{:}23.647$ more likely to die of heart disease

NOTE Confidence: 0.81352216

 $00:13:23.647 \longrightarrow 00:13:25.623$ and other chronic conditions rather

NOTE Confidence: 0.81352216

00:13:25.623 --> 00:13:27.519 than from endometrial cancer,

NOTE Confidence: 0.81352216

 $00:13:27.520 \longrightarrow 00:13:32.280$ and this highlights how important it is to.

NOTE Confidence: 0.81352216

 $00:13:32.280 \longrightarrow 00:13:35.250$ To come.

NOTE Confidence: 0.81352216

 $00:13:35.250 \longrightarrow 00:13:36.670$ To incorporate lifestyle changes

NOTE Confidence: 0.81352216

 $00{:}13{:}36.670 \dashrightarrow 00{:}13{:}38.800$ as well as part of endometrial

NOTE Confidence: 0.81352216

 $00:13:38.861 \longrightarrow 00:13:39.989$ cancer survivorship.

NOTE Confidence: 0.84878683

 $00:13:42.310 \longrightarrow 00:13:44.896$ Moving on to a barren cancer,

NOTE Confidence: 0.84878683

00:13:44.900 --> 00:13:47.170 our understanding of ovarian cancer

NOTE Confidence: 0.84878683

 $00:13:47.170 \longrightarrow 00:13:49.901$ has really greatly advanced over the

NOTE Confidence: 0.84878683

 $00{:}13{:}49.901 \dashrightarrow 00{:}13{:}52.247$ past decade and how we conceptualize,

NOTE Confidence: 0.84878683

00:13:52.250 --> 00:13:54.938 aware in cancer now is based on

NOTE Confidence: 0.84878683

 $00:13:54.938 \longrightarrow 00:13:57.429$ the origins of ovarian cancer,

 $00:13:57.430 \longrightarrow 00:13:59.590$ with type one actually often

NOTE Confidence: 0.84878683

00:13:59.590 --> 00:14:00.886 arising in endometriosis,

NOTE Confidence: 0.84878683

 $00:14:00.890 \longrightarrow 00:14:03.482$ which is a very common benign

NOTE Confidence: 0.84878683

 $00:14:03.482 \longrightarrow 00:14:05.210$ condition of reproductive age.

NOTE Confidence: 0.84878683

 $00{:}14{:}05.210 \dashrightarrow 00{:}14{:}07.796$ Women as well as from borderline

NOTE Confidence: 0.84878683

 $00:14:07.796 \longrightarrow 00:14:08.658$ precursor lesions.

NOTE Confidence: 0.84878683

 $00:14:08.660 \longrightarrow 00:14:12.118$ In contrast, Type 2 which are the.

NOTE Confidence: 0.84878683

 $00:14:12.118 \longrightarrow 00:14:15.574$ I tend to be more aggressive.

NOTE Confidence: 0.84878683

00:14:15.580 --> 00:14:18.338 It often actually rise in the fallopian

NOTE Confidence: 0.84878683

00:14:18.338 --> 00:14:21.118 tube lining cells initiated by insights,

NOTE Confidence: 0.84878683

00:14:21.120 --> 00:14:23.250 you cancer cells cause sticks,

NOTE Confidence: 0.84878683

 $00:14:23.250 \longrightarrow 00:14:26.976$ so this is really kind of a paradigm shift

NOTE Confidence: 0.84878683

 $00{:}14{:}26.976 \dashrightarrow 00{:}14{:}30.529$ in how we understand ovarian cancer.

NOTE Confidence: 0.84878683

 $00:14:30.530 \longrightarrow 00:14:34.610$ And is related to understanding more of the

NOTE Confidence: 0.84878683

 $00:14:34.610 \longrightarrow 00:14:38.139$ molecular and genetics of ovarian cancer.

NOTE Confidence: 0.84878683

 $00{:}14{:}38.140 \dashrightarrow 00{:}14{:}41.158$ We know that there's several very

 $00:14:41.158 \longrightarrow 00:14:43.690$ well established ways that we

NOTE Confidence: 0.84878683

00:14:43.690 --> 00:14:46.276 can lower or ovarian cancer risk.

NOTE Confidence: 0.84878683

00:14:46.280 --> 00:14:48.680 Breastfeeding and pregnancy are associated

NOTE Confidence: 0.84878683

00:14:48.680 --> 00:14:51.042 with decreased ovarian cancer risks,

NOTE Confidence: 0.84878683

 $00:14:51.042 \longrightarrow 00:14:53.808$ and really anything that decreases the

NOTE Confidence: 0.84878683

00:14:53.808 --> 00:14:56.818 number of lifetime abula Tori cycles,

NOTE Confidence: 0.84878683

 $00:14:56.820 \longrightarrow 00:14:58.732$ including oral contraceptive use

NOTE Confidence: 0.84878683

 $00{:}14{:}58.732 \dashrightarrow 00{:}15{:}00.644$ during the reproductive years.

NOTE Confidence: 0.84878683

 $00:15:00.650 \longrightarrow 00:15:04.010$ In addition, removal of the fallopian tubes,

NOTE Confidence: 0.84878683

 $00:15:04.010 \longrightarrow 00:15:07.906$ such as having a self inject a MIS.

NOTE Confidence: 0.84878683

 $00:15:07.910 \longrightarrow 00:15:08.862$ For, for,

NOTE Confidence: 0.84878683

 $00:15:08.862 \longrightarrow 00:15:11.718$ for Tubal ligation can greatly reduce

NOTE Confidence: 0.84878683

 $00{:}15{:}11.718 \dashrightarrow 00{:}15{:}14.799$ the risk of ovarian cancer women,

NOTE Confidence: 0.84878683

 $00:15:14.800 \longrightarrow 00:15:17.400$ especially if they have first

NOTE Confidence: 0.84878683

 $00:15:17.400 \longrightarrow 00:15:20.000$ degree relatives with breast cancer

 $00:15:20.088 \longrightarrow 00:15:21.688$ and or first degree.

NOTE Confidence: 0.84878683

00:15:21.690 --> 00:15:24.150 Relatives with ovarian cancer or

NOTE Confidence: 0.84878683

00:15:24.150 --> 00:15:26.610 personal history of breast cancer,

NOTE Confidence: 0.84878683

 $00:15:26.610 \longrightarrow 00:15:29.338$ should consider genetic counseling

NOTE Confidence: 0.84878683

 $00:15:29.338 \longrightarrow 00:15:32.066$ and high risk screening.

NOTE Confidence: 0.84878683

00:15:32.070 --> 00:15:35.446 And just wanted to highlight some of the

NOTE Confidence: 0.84878683

00:15:35.446 --> 00:15:38.448 warning symptoms and signs of ovarian cancer,

NOTE Confidence: 0.84878683

 $00:15:38.450 \longrightarrow 00:15:41.000$ which unfortunately can sometimes be vague,

NOTE Confidence: 0.84878683

 $00{:}15{:}41.000 \mathrel{--}{>} 00{:}15{:}43.120$ such as abdominal bloating change,

NOTE Confidence: 0.84878683

 $00:15:43.120 \longrightarrow 00:15:43.970$ increased waistline,

NOTE Confidence: 0.84878683

 $00{:}15{:}43.970 --> 00{:}15{:}44.820 \text{ pelvic pain},$

NOTE Confidence: 0.84878683

 $00:15:44.820 \longrightarrow 00:15:46.095$ change in bowel,

NOTE Confidence: 0.84878683

00:15:46.100 --> 00:15:46.948 bladder habits,

NOTE Confidence: 0.84878683

 $00:15:46.948 \longrightarrow 00:15:47.796$ abnormal bleeding,

NOTE Confidence: 0.84878683

00:15:47.796 --> 00:15:49.916 nausea or feeling of fullness,

NOTE Confidence: 0.84878683

00:15:49.920 --> 00:15:52.846 and most of concern would be when

 $00:15:52.846 \longrightarrow 00:15:54.610$ these symptoms are persistent

NOTE Confidence: 0.84878683

00:15:54.610 --> 00:15:57.564 and don't go away on their own,

NOTE Confidence: 0.84878683

 $00:15:57.570 \longrightarrow 00:15:59.695$ and that should prompt a

NOTE Confidence: 0.84878683

 $00:15:59.695 \longrightarrow 00:16:00.545$ gynecological examination.

NOTE Confidence: 0.8473171

 $00:16:02.650 \longrightarrow 00:16:05.738$ We also have learned a lot about hereditary

NOTE Confidence: 0.8473171

00:16:05.738 --> 00:16:08.310 breast and ovarian cancer syndrome,

NOTE Confidence: 0.8473171

 $00:16:08.310 \longrightarrow 00:16:10.740$ which are you've probably all heard

NOTE Confidence: 0.8473171

 $00{:}16{:}10.740 \dashrightarrow 00{:}16{:}13.570$ of BRCA one and BRCA two mutations

NOTE Confidence: 0.8473171

 $00{:}16{:}13.570 \dashrightarrow 00{:}16{:}16.776$ so we have very good ways to detect

NOTE Confidence: 0.8473171

 $00:16:16.776 \longrightarrow 00:16:19.321$ the presence of inherited changes

NOTE Confidence: 0.8473171

 $00:16:19.321 \longrightarrow 00:16:22.236$ through blood or saliva tests and

NOTE Confidence: 0.8473171

 $00:16:22.236 \longrightarrow 00:16:24.864$ that is to detect whether you've

NOTE Confidence: 0.8473171

 $00:16:24.864 \longrightarrow 00:16:27.515$ inherited these one of these genetic

NOTE Confidence: 0.8473171

 $00:16:27.515 \longrightarrow 00:16:30.053$ changes from your mother or father.

NOTE Confidence: 0.8473171

 $00:16:30.060 \longrightarrow 00:16:31.864$ Women with hereditary breast

 $00:16:31.864 \longrightarrow 00:16:33.217$ and ovarian cancer.

NOTE Confidence: 0.8473171

 $00{:}16{:}33.220 \dashrightarrow 00{:}16{:}35.680$ Syndrome benefit from high risk

NOTE Confidence: 0.8473171

 $00:16:35.680 \longrightarrow 00:16:38.140$ screening risk reducing surgery and

NOTE Confidence: 0.8473171

00:16:38.219 --> 00:16:41.096 I just wanted to highlight that the

NOTE Confidence: 0.8473171

 $00:16:41.096 \longrightarrow 00:16:43.863$ risk resort reducing surgery is done

NOTE Confidence: 0.8473171

 $00:16:43.863 \longrightarrow 00:16:46.288$ in a minimally invasive ambulatory

NOTE Confidence: 0.8473171

 $00:16:46.288 \longrightarrow 00:16:48.940$ surgery usually takes less than one

NOTE Confidence: 0.8473171

 $00:16:48.940 \longrightarrow 00:16:51.460$ hour with tiny incisions and is

NOTE Confidence: 0.8473171

 $00{:}16{:}51.545 {\:{\circ}{\circ}{\circ}}>00{:}16{:}54.772$ recommended around the ages of 35 to

NOTE Confidence: 0.8473171

00:16:54.772 --> 00:16:57.560 45 after completion of childbearing.

NOTE Confidence: 0.8473171

00:16:57.560 --> 00:16:58.600 Of course,

NOTE Confidence: 0.8473171

 $00:16:58.600 \longrightarrow 00:17:01.200$ this is individualized based on

NOTE Confidence: 0.8473171

 $00:17:01.200 \longrightarrow 00:17:04.020$ the patient and the patients.

NOTE Confidence: 0.8473171

 $00:17:04.020 \longrightarrow 00:17:05.520$ Visual considerations.

NOTE Confidence: 0.83129567

 $00:17:07.830 \longrightarrow 00:17:11.590$ And Lastly, I would like to highlight some

NOTE Confidence: 0.83129567

 $00:17:11.590 \longrightarrow 00:17:14.718$ recent advances honoring cancer treatment.

00:17:14.720 --> 00:17:17.779 We know more and more that tumor

NOTE Confidence: 0.83129567

 $00{:}17{:}17.779 \dashrightarrow 00{:}17{:}20.481$ debulking remains a cornerstone of

NOTE Confidence: 0.83129567

 $00:17:20.481 \longrightarrow 00:17:23.726$ optimal treatment and improve survival.

NOTE Confidence: 0.83129567

 $00:17:23.730 \longrightarrow 00:17:26.450$ So seeing a gynecological oncologist

NOTE Confidence: 0.83129567

 $00{:}17{:}26.450 \dashrightarrow 00{:}17{:}29.775$ an having surgery either at the

NOTE Confidence: 0.83129567

00:17:29.775 --> 00:17:32.883 initial diagnosis or at an interval

NOTE Confidence: 0.83129567

00:17:32.883 --> 00:17:35.124 after chemotherapy is important

NOTE Confidence: 0.83129567

 $00:17:35.124 \longrightarrow 00:17:38.099$ for optimal chances of survival.

NOTE Confidence: 0.83129567

 $00:17:38.100 \longrightarrow 00:17:40.115$ We performed we recommend genetic

NOTE Confidence: 0.83129567

 $00{:}17{:}40.115 \dashrightarrow 00{:}17{:}42.587$ counseling and testing in all women

NOTE Confidence: 0.83129567

 $00:17:42.587 \longrightarrow 00:17:44.557$ diagnosed with aware in cancer.

NOTE Confidence: 0.83129567

 $00:17:44.560 \longrightarrow 00:17:45.368$ In addition,

NOTE Confidence: 0.83129567

 $00{:}17{:}45.368 \to 00{:}17{:}48.196$ for all women with advanced ovarian cancer,

NOTE Confidence: 0.83129567

 $00:17:48.200 \longrightarrow 00:17:50.790$ we suggest tumor molecular testing

NOTE Confidence: 0.83129567

 $00:17:50.790 \longrightarrow 00:17:53.380$ and this is important because.

 $00:17:53.380 \longrightarrow 00:17:55.344$ They really guide treatment

NOTE Confidence: 0.83129567

 $00:17:55.344 \longrightarrow 00:17:58.290$ decisions on how can we most

NOTE Confidence: 0.83129567

 $00:17:58.383 \longrightarrow 00:18:01.628$ effectively treat the women's cancer?

NOTE Confidence: 0.83129567

 $00:18:01.630 \longrightarrow 00:18:04.484$ I'd like to summarize with some

NOTE Confidence: 0.83129567

 $00:18:04.484 \longrightarrow 00:18:07.352$ take home messages about each of

NOTE Confidence: 0.83129567

 $00:18:07.352 \longrightarrow 00:18:10.139$ the major types of GYN cancer.

NOTE Confidence: 0.83129567

 $00:18:10.140 \longrightarrow 00:18:13.094$ The Great News is that cervical cancer

NOTE Confidence: 0.83129567

 $00:18:13.094 \longrightarrow 00:18:15.491$ is preventable through vaccination and

NOTE Confidence: 0.83129567

 $00{:}18{:}15.491 \dashrightarrow 00{:}18{:}18.659$ screening for endometrial and ovarian cancer.

NOTE Confidence: 0.83129567

00:18:18.660 --> 00:18:19.995 Surgery by gynecology,

NOTE Confidence: 0.83129567

 $00{:}18{:}19.995 \dashrightarrow 00{:}18{:}21.775$ on cologists remains a cornerstone

NOTE Confidence: 0.83129567

00:18:21.775 --> 00:18:24.330 of treatment and maximizes survival.

NOTE Confidence: 0.83129567

 $00:18:24.330 \longrightarrow 00:18:26.874$ And we can now offer precision

NOTE Confidence: 0.83129567

 $00:18:26.874 \longrightarrow 00:18:29.268$ personalized medicine for all patients

NOTE Confidence: 0.83129567

 $00:18:29.268 \longrightarrow 00:18:31.756$ with advanced gynecological cancer.

NOTE Confidence: 0.83129567

00:18:31.760 --> 00:18:32.670 And this,

00:18:32.670 --> 00:18:34.945 of course includes multimodal therapies,

NOTE Confidence: 0.83129567

 $00{:}18{:}34.950 \dashrightarrow 00{:}18{:}38.233$ where we work closely with our radiation

NOTE Confidence: 0.83129567

 $00{:}18{:}38.233 \dashrightarrow 00{:}18{:}40.860$ on cology experts such as Doctor Dale,

NOTE Confidence: 0.83129567

 $00:18:40.860 \longrightarrow 00:18:43.590$ who will be speaking as well

NOTE Confidence: 0.83129567

 $00:18:43.590 \longrightarrow 00:18:45.410$ today and other experts,

NOTE Confidence: 0.83129567

00:18:45.410 --> 00:18:46.310 including geneticists,

NOTE Confidence: 0.83129567

 $00:18:46.310 \longrightarrow 00:18:48.560$ medical oncologist and the patients

NOTE Confidence: 0.83129567

 $00{:}18{:}48.560 \dashrightarrow 00{:}18{:}51.333$ general OB GY Ensan primary care

NOTE Confidence: 0.83129567

 $00{:}18{:}51.333 \dashrightarrow 00{:}18{:}53.598$ physicians for survivorship care plans.

NOTE Confidence: 0.83129567

00:18:53.600 --> 00:18:57.048 So thank you so much for for the

NOTE Confidence: 0.83129567

 $00{:}18{:}57.048 \dashrightarrow 00{:}18{:}59.970$ chance to speak to you today.

NOTE Confidence: 0.8536724

 $00:19:02.550 \dashrightarrow 00:19:04.920$ Alright, thank you so much Gloria.

NOTE Confidence: 0.8799542

 $00:19:07.170 \longrightarrow 00:19:08.506$ If there's any questions,

NOTE Confidence: 0.8799542

 $00:19:08.506 \longrightarrow 00:19:11.151$ if you guys would like to just put

NOTE Confidence: 0.8799542

 $00:19:11.151 \longrightarrow 00:19:13.570$ them in the chat, feel free. We can.

 $00:19:13.570 \longrightarrow 00:19:17.005$ Again, this is very informal and we can

NOTE Confidence: 0.8799542

 $00{:}19{:}17.005 \dashrightarrow 00{:}19{:}20.198$ ask answer questions as as we continue.

NOTE Confidence: 0.8799542

 $00{:}19{:}20.200 \dashrightarrow 00{:}19{:}23.448$ I'm gonna take them a few minutes to

NOTE Confidence: 0.8799542

 $00:19:23.448 \longrightarrow 00:19:25.793$ continue the conversation that Doctor

NOTE Confidence: 0.8799542

 $00:19:25.793 \longrightarrow 00:19:29.727$ Wong just just started and talk a little

NOTE Confidence: 0.8799542

 $00{:}19{:}29.727 \dashrightarrow 00{:}19{:}33.094$ bit more about breast cancer and ovarian

NOTE Confidence: 0.8799542

 $00:19:33.094 \longrightarrow 00:19:36.826$ cancer and how they relate to each other.

NOTE Confidence: 0.8799542

 $00:19:36.830 \longrightarrow 00:19:39.140$ And I'll take a look.

NOTE Confidence: 0.8799542

 $00:19:39.140 \longrightarrow 00:19:41.450$ I'll talk a little bit

NOTE Confidence: 0.8799542

 $00:19:41.450 \longrightarrow 00:19:43.298$ about really my passion,

NOTE Confidence: 0.8799542

 $00{:}19{:}43.300 \dashrightarrow 00{:}19{:}46.527$ which is early detection of these cancers.

NOTE Confidence: 0.8799542

 $00:19:46.530 \longrightarrow 00:19:52.720$ So hold on one second, let me just share my.

NOTE Confidence: 0.8799542

 $00:19:52.720 \longrightarrow 00:19:56.536$ So like the long spoke so great about kind

NOTE Confidence: 0.8799542

 $00:19:56.536 \longrightarrow 00:20:00.359$ of logic answers and how the paradigm.

NOTE Confidence: 0.8799542

00:20:00.360 --> 00:20:02.240 This cancers is changing,

NOTE Confidence: 0.8799542

00:20:02.240 --> 00:20:05.711 so I'd like to take the next

 $00:20:05.711 \longrightarrow 00:20:09.540$ minutes to discuss a little bit more

NOTE Confidence: 0.8799542

 $00:20:09.540 \longrightarrow 00:20:12.369$ about detection of these cancers.

NOTE Confidence: 0.8799542

00:20:12.370 --> 00:20:15.492 How much time and effort is being

NOTE Confidence: 0.8799542

00:20:15.492 --> 00:20:18.833 spent right now and improving early

NOTE Confidence: 0.8799542

 $00:20:18.833 \longrightarrow 00:20:21.381$ detection in improving prevention

NOTE Confidence: 0.8799542

 $00:20:21.381 \longrightarrow 00:20:25.707$ of these cancers as well as the fact

NOTE Confidence: 0.8799542

 $00:20:25.707 \longrightarrow 00:20:28.027$ that the achievement of cancers

NOTE Confidence: 0.8799542

 $00:20:28.030 \longrightarrow 00:20:30.078$ nowadays really has become.

NOTE Confidence: 0.8799542

00:20:30.078 --> 00:20:31.760 Truly, a personalized approach.

NOTE Confidence: 0.8799542

00:20:31.760 --> 00:20:32.540 You know,

NOTE Confidence: 0.8799542

 $00:20:32.540 \longrightarrow 00:20:34.856$ we don't treat cancers the same

NOTE Confidence: 0.8799542

 $00:20:34.856 \longrightarrow 00:20:36.830$ way just because cancer said.

NOTE Confidence: 0.8799542

 $00:20:36.830 \longrightarrow 00:20:38.000$ If the same,

NOTE Confidence: 0.8799542

 $00{:}20{:}38.000 \dashrightarrow 00{:}20{:}40.340$ we truly treat the patient would

NOTE Confidence: 0.8799542

 $00:20:40.340 \longrightarrow 00:20:42.716$ truly treat the woman we study

 $00:20:42.716 \longrightarrow 00:20:44.626$ all the cancers we study,

NOTE Confidence: 0.8799542

 $00{:}20{:}44.630 \dashrightarrow 00{:}20{:}47.012$ all the tumors and knowing what

NOTE Confidence: 0.8799542

00:20:47.012 --> 00:20:48.920 mutations that particular tumor has,

NOTE Confidence: 0.8799542

 $00:20:48.920 \longrightarrow 00:20:51.260$ we are able to offer targeted

NOTE Confidence: 0.8799542

 $00:20:51.260 \longrightarrow 00:20:52.820$ specific therapy to her.

NOTE Confidence: 0.8799542

00:20:52.820 --> 00:20:54.770 And that's only something different.

NOTE Confidence: 0.8799542

 $00:20:54.770 \longrightarrow 00:20:57.110$ That's not anything that we used

NOTE Confidence: 0.8799542

 $00:20:57.110 \longrightarrow 00:21:00.032$ to do before, and we are super,

NOTE Confidence: 0.8799542

 $00{:}21{:}00.032 --> 00{:}21{:}01.346 \ \mathrm{super} \ \mathrm{excited} \ \mathrm{about}.$

NOTE Confidence: 0.8799542

00:21:01.350 --> 00:21:03.846 The future and about the present,

NOTE Confidence: 0.8799542

 $00:21:03.850 \longrightarrow 00:21:06.510$ but I'd like to talk a little

NOTE Confidence: 0.8799542

 $00:21:06.510 \longrightarrow 00:21:08.859$ bit about what comes before.

NOTE Confidence: 0.8799542

 $00:21:08.860 \longrightarrow 00:21:11.758$ I'd like to talk about not just

NOTE Confidence: 0.8799542

 $00{:}21{:}11.758 \dashrightarrow 00{:}21{:}13.859$ about early detection of cancer,

NOTE Confidence: 0.8799542

 $00:21:13.860 \longrightarrow 00:21:15.950$ but about the Holy Grail.

NOTE Confidence: 0.8799542

 $00:21:15.950 \longrightarrow 00:21:19.340$ the Holy Grail is cancer prevention.

00:21:19.340 --> 00:21:22.210 So so much of what we're trying

NOTE Confidence: 0.8799542

 $00:21:22.210 \longrightarrow 00:21:24.940$ to do now is identified.

NOTE Confidence: 0.8799542

 $00:21:24.940 \longrightarrow 00:21:28.048$ The women who are at higher risk

NOTE Confidence: 0.8799542

 $00:21:28.048 \longrightarrow 00:21:30.844$ for different cancers and a great

NOTE Confidence: 0.8799542

 $00:21:30.844 \longrightarrow 00:21:33.604$ amount of that information comes from

NOTE Confidence: 0.8799542

 $00:21:33.604 \longrightarrow 00:21:36.617$ family history and from the genetics.

NOTE Confidence: 0.8799542

 $00:21:36.620 \longrightarrow 00:21:39.742$ And this is just one of the

NOTE Confidence: 0.8799542

 $00:21:39.742 \longrightarrow 00:21:43.160$ examples of one of my patients who,

NOTE Confidence: 0.8799542

 $00{:}21{:}43.160 \dashrightarrow 00{:}21{:}45.495$ when we started discussing her

NOTE Confidence: 0.8799542

00:21:45.495 --> 00:21:46.429 family history,

NOTE Confidence: 0.8799542

00:21:46.430 --> 00:21:48.338 clearly had genetic predisposition

NOTE Confidence: 0.8799542

 $00:21:48.338 \longrightarrow 00:21:49.769$ and through which.

NOTE Confidence: 0.8799542

 $00{:}21{:}49.770 \dashrightarrow 00{:}21{:}52.776$ Her genetic mutation was found and

NOTE Confidence: 0.8799542

 $00{:}21{:}52.776 \dashrightarrow 00{:}21{:}56.179$ hence cancer in her was prevented.

NOTE Confidence: 0.8799542

 $00:21:56.180 \longrightarrow 00:21:58.665$ And the driving hypothesis of so much

00:21:58.665 --> 00:22:01.222 of this work is that many patients

NOTE Confidence: 0.8799542

 $00:22:01.222 \longrightarrow 00:22:03.871$ might be at risk for several cancers

NOTE Confidence: 0.8799542

00:22:03.871 --> 00:22:06.547 based on personal or family history,

NOTE Confidence: 0.8799542

 $00:22:06.550 \longrightarrow 00:22:09.614$ kinetic status or personal history of a TPA,

NOTE Confidence: 0.8799542

 $00:22:09.620 \longrightarrow 00:22:10.013$ hyperplasia.

NOTE Confidence: 0.8799542

00:22:10.013 --> 00:22:12.764 And it's so so important to know

NOTE Confidence: 0.8799542

 $00:22:12.764 \longrightarrow 00:22:14.609$ because that's the first step.

NOTE Confidence: 0.8799542

 $00:22:14.610 \longrightarrow 00:22:16.842$ First step is the knowledge of

NOTE Confidence: 0.8799542

 $00{:}22{:}16.842 \dashrightarrow 00{:}22{:}19.572$ knowing who is at high risk and

NOTE Confidence: 0.8799542

00:22:19.572 --> 00:22:22.281 knowing what they are high risk for,

NOTE Confidence: 0.8799542

 $00:22:22.290 \longrightarrow 00:22:25.321$ because if we know that then different

NOTE Confidence: 0.8799542

00:22:25.321 --> 00:22:27.279 modifications Kim can be done.

NOTE Confidence: 0.8799542

 $00:22:27.280 \longrightarrow 00:22:29.975$ And we will talk as to what

NOTE Confidence: 0.8799542

 $00:22:29.975 \longrightarrow 00:22:31.130$ those modifications are,

NOTE Confidence: 0.8799542

 $00:22:31.130 \longrightarrow 00:22:33.060$ and they're always the same.

NOTE Confidence: 0.8799542

 $00{:}22{:}33.060 \dashrightarrow 00{:}22{:}34.980$ They always either surveillance or

 $00:22:34.980 \longrightarrow 00:22:36.516$ chemoprevention or surgical intervention.

NOTE Confidence: 0.8799542

 $00:22:36.520 \longrightarrow 00:22:38.096$ So for any cancer,

NOTE Confidence: 0.8799542

 $00:22:38.096 \longrightarrow 00:22:40.460$ when we worry that the patient

NOTE Confidence: 0.8799542

 $00:22:40.542 \longrightarrow 00:22:41.910$ could be at risk,

NOTE Confidence: 0.8799542

 $00:22:41.910 \longrightarrow 00:22:44.172$ we talk about what can be

NOTE Confidence: 0.8799542

 $00:22:44.172 \longrightarrow 00:22:45.680$ done to decrease that

NOTE Confidence: 0.83732945

00:22:45.761 --> 00:22:49.127 risk or hopefully eliminate it completely.

NOTE Confidence: 0.83732945

00:22:49.130 --> 00:22:51.230 Um, we traditionally management of

NOTE Confidence: 0.83732945

 $00:22:51.230 \longrightarrow 00:22:53.760$ this patient has not been easy.

NOTE Confidence: 0.83732945

00:22:53.760 --> 00:22:56.058 You know, there's a lot of

NOTE Confidence: 0.83732945

00:22:56.058 --> 00:22:58.390 frustration in the medical community,

NOTE Confidence: 0.83732945

 $00:22:58.390 \longrightarrow 00:23:01.057$ but they were more so among women

NOTE Confidence: 0.83732945

 $00:23:01.057 \longrightarrow 00:23:04.495$ in about an among men and patients

NOTE Confidence: 0.83732945

 $00:23:04.495 \longrightarrow 00:23:06.699$ and families that frequently.

NOTE Confidence: 0.83732945

 $00:23:06.700 \longrightarrow 00:23:08.608$ Please join the limitations were taken

00:23:08.608 --> 00:23:11.389 care of by a very specific provider.

NOTE Confidence: 0.83732945

00:23:11.390 --> 00:23:12.838 Very specific. You know,

NOTE Confidence: 0.83732945

 $00{:}23{:}12.838 \dashrightarrow 00{:}23{:}15.781$ one Doctor Who really did not talk to

NOTE Confidence: 0.83732945

 $00:23:15.781 \longrightarrow 00:23:18.642$ other doctors and there was a lot of

NOTE Confidence: 0.83732945

 $00:23:18.642 \longrightarrow 00:23:20.602$ disconnect about these mutations and

NOTE Confidence: 0.83732945

00:23:20.602 --> 00:23:23.188 frequently women did not get the care

NOTE Confidence: 0.83732945

 $00:23:23.188 \longrightarrow 00:23:25.102$ that they needed because you know,

NOTE Confidence: 0.83732945

 $00:23:25.110 \longrightarrow 00:23:27.210$ if somebody had a specific mutation

NOTE Confidence: 0.83732945

 $00{:}23{:}27.210 \to 00{:}23{:}29.799$ that had to do with the breast,

NOTE Confidence: 0.83732945

 $00:23:29.800 \longrightarrow 00:23:32.488$ they would just be managed by the breast

NOTE Confidence: 0.83732945

 $00{:}23{:}32.488 \dashrightarrow 00{:}23{:}34.095$ position without really understanding

NOTE Confidence: 0.83732945

 $00:23:34.095 \longrightarrow 00:23:36.705$ the correlations and breast and ovary.

NOTE Confidence: 0.83732945

 $00:23:36.710 \longrightarrow 00:23:39.710$ And making sure that the whole team of

NOTE Confidence: 0.83732945

 $00:23:39.710 \longrightarrow 00:23:42.666$ providers is involved in the optimal care.

NOTE Confidence: 0.83732945

00:23:42.670 --> 00:23:44.694 And that is what we're trying to correct,

NOTE Confidence: 0.83732945

 $00:23:44.700 \longrightarrow 00:23:47.476$ and that is what we're trying to improve.

 $00:23:47.480 \longrightarrow 00:23:50.416$ So we know now that approximately 10% of

NOTE Confidence: 0.83732945

 $00{:}23{:}50.416 \to 00{:}23{:}52.246$ cancers are something called hereditary,

NOTE Confidence: 0.83732945

 $00:23:52.250 \longrightarrow 00:23:54.446$ which means that there's a mutation

NOTE Confidence: 0.83732945

 $00:23:54.446 \longrightarrow 00:23:55.544$ in the gene.

NOTE Confidence: 0.83732945

00:23:55.550 --> 00:23:58.119 However, we know so much more now,

NOTE Confidence: 0.83732945

00:23:58.120 --> 00:24:01.056 and we now believe that much bigger number,

NOTE Confidence: 0.83732945

00:24:01.060 --> 00:24:03.994 closer to 30 if not 50% actually carry

NOTE Confidence: 0.83732945

 $00:24:03.994 \longrightarrow 00:24:05.829$ some sort of genetic predisposition,

NOTE Confidence: 0.83732945

 $00{:}24{:}05.830 \to 00{:}24{:}09.124$ and there's some sort of a gene that could

NOTE Confidence: 0.83732945

 $00:24:09.124 \longrightarrow 00:24:12.094$ be responsible for different cancers as

NOTE Confidence: 0.83732945

 $00{:}24{:}12.094 \dashrightarrow 00{:}24{:}15.838$ well As for other cancers in the family.

NOTE Confidence: 0.83732945

 $00:24:15.840 \longrightarrow 00:24:18.616$ So what are the risk factors you know

NOTE Confidence: 0.83732945

 $00:24:18.616 \longrightarrow 00:24:20.746$ so frequently in in the office?

NOTE Confidence: 0.83732945

 $00:24:20.750 \longrightarrow 00:24:23.166$ I talked to to my women and my

NOTE Confidence: 0.83732945

00:24:23.166 --> 00:24:25.320 patients and we always talk about,

00:24:25.320 --> 00:24:25.974 you know,

NOTE Confidence: 0.83732945

 $00:24:25.974 \longrightarrow 00:24:28.263$ quit the cancers that they have be

NOTE Confidence: 0.83732945

 $00:24:28.263 \longrightarrow 00:24:30.863$ due to mutation and how do we know

NOTE Confidence: 0.83732945

 $00:24:30.863 \longrightarrow 00:24:33.169$ those likely to be due to mutation?

NOTE Confidence: 0.83732945

00:24:33.170 --> 00:24:34.895 And it's super super important

NOTE Confidence: 0.83732945

00:24:34.895 --> 00:24:37.283 to know because we want to make

NOTE Confidence: 0.83732945

 $00:24:37.283 \longrightarrow 00:24:39.059$ sure that if that's the case,

NOTE Confidence: 0.83732945

 $00:24:39.060 \longrightarrow 00:24:41.573$ we identify them so that further cancers

NOTE Confidence: 0.83732945

00:24:41.573 --> 00:24:44.287 can be prevented in her and in her family.

NOTE Confidence: 0.83732945

00:24:44.290 --> 00:24:46.432 So the risk factors for having some

NOTE Confidence: 0.83732945

00:24:46.432 --> 00:24:48.490 sort of genetic hereditary cancer.

NOTE Confidence: 0.83732945

 $00:24:48.490 \longrightarrow 00:24:50.428$ It is early age of onset,

NOTE Confidence: 0.83732945

 $00:24:50.430 \longrightarrow 00:24:53.244$ so when cancers happen younger in life.

NOTE Confidence: 0.83732945

 $00:24:53.250 \longrightarrow 00:24:54.682$ Multiple affected family members

NOTE Confidence: 0.83732945

 $00:24:54.682 \longrightarrow 00:24:57.206$ and you saw the pedigree I showed

NOTE Confidence: 0.83732945

 $00:24:57.206 \longrightarrow 00:24:59.078$ you in the beginning of that.

 $00:24:59.080 \longrightarrow 00:25:01.453$ Some like we always talk about related

NOTE Confidence: 0.83732945

 $00{:}25{:}01.453 \dashrightarrow 00{:}25{:}03.880$ cancers in the family and it's very,

NOTE Confidence: 0.83732945

 $00:25:03.880 \longrightarrow 00:25:05.715$ very important to remember that

NOTE Confidence: 0.83732945

 $00:25:05.715 \longrightarrow 00:25:07.917$ the related cancers in the family

NOTE Confidence: 0.83732945

 $00:25:07.917 \longrightarrow 00:25:09.705$ is not just what we think.

NOTE Confidence: 0.83732945

 $00:25:09.710 \longrightarrow 00:25:12.454$ You know, for somebody who has breast cancer,

NOTE Confidence: 0.83732945

00:25:12.460 --> 00:25:14.854 we're not just talking about breast cancer,

NOTE Confidence: 0.83732945

 $00:25:14.860 \longrightarrow 00:25:17.282$ we're talking about breast cancer having a

NOTE Confidence: 0.83732945

 $00:25:17.282 \longrightarrow 00:25:19.318$ very close relationship to ovarian cancer.

NOTE Confidence: 0.83732945

 $00{:}25{:}19.320 \dashrightarrow 00{:}25{:}21.980$ And now we also think this certain

NOTE Confidence: 0.83732945

 $00:25:21.980 \longrightarrow 00:25:23.690$ subtypes of uterine cancer.

NOTE Confidence: 0.83732945

 $00:25:23.690 \longrightarrow 00:25:26.364$ That are also part part of that

NOTE Confidence: 0.83732945

00:25:26.364 --> 00:25:27.510 family of cancers.

NOTE Confidence: 0.83732945

 $00{:}25{:}27.510 \dashrightarrow 00{:}25{:}29.038$ This includes pancreatic cancer.

NOTE Confidence: 0.83732945

 $00:25:29.038 \longrightarrow 00:25:31.330$ This includes prostate cancer in men.

00:25:31.330 --> 00:25:32.040 You know,

NOTE Confidence: 0.83732945

 $00{:}25{:}32.040 \dashrightarrow 00{:}25{:}34.525$ this is very important and we talk

NOTE Confidence: 0.83732945

00:25:34.525 --> 00:25:36.298 about these female jeans.

NOTE Confidence: 0.83732945

00:25:36.300 --> 00:25:37.030 You know,

NOTE Confidence: 0.83732945

00:25:37.030 --> 00:25:40.500 the Braca genes that this is not only women,

NOTE Confidence: 0.83732945

 $00:25:40.500 \longrightarrow 00:25:41.694$ but this effects.

NOTE Confidence: 0.83732945

 $00:25:41.694 \longrightarrow 00:25:44.082$ There is certainly males that this

NOTE Confidence: 0.83732945

 $00:25:44.082 \longrightarrow 00:25:45.079$ effects as well.

NOTE Confidence: 0.83732945

 $00:25:45.080 \longrightarrow 00:25:48.926$ This includes melanomas of the skin.

NOTE Confidence: 0.83732945

00:25:48.930 --> 00:25:49.632 Multiple primary,

NOTE Confidence: 0.83732945

 $00:25:49.632 \longrightarrow 00:25:52.440$ so a patient woman or man who has

NOTE Confidence: 0.8384719

 $00:25:52.510 \longrightarrow 00:25:55.646$ more than one cancer male breast cancer is

NOTE Confidence: 0.8384719

 $00:25:55.646 \longrightarrow 00:25:58.427$ something that we always very careful with.

NOTE Confidence: 0.8384719

 $00:25:58.430 \longrightarrow 00:26:00.710$ Male breast cancer is very frequently

NOTE Confidence: 0.8384719

 $00:26:00.710 \longrightarrow 00:26:02.230$ associated with genetic mutation.

NOTE Confidence: 0.8384719

00:26:02.230 --> 00:26:05.270 In the old days, like five years back,

 $00:26:05.270 \longrightarrow 00:26:08.690$ we used to talk a lot about Jewish ancestry.

NOTE Confidence: 0.8384719

00:26:08.690 --> 00:26:10.590 Dash cannot see Jewish women,

NOTE Confidence: 0.8384719

00:26:10.590 --> 00:26:13.540 as I'm sure a lot of us know carry higher

NOTE Confidence: 0.8384719

 $00:26:13.620 \longrightarrow 00:26:16.290$ prevalence of this genetic mutations.

NOTE Confidence: 0.8384719

 $00:26:16.290 \longrightarrow 00:26:19.251$ However, recently we have found out the

NOTE Confidence: 0.8384719

00:26:19.251 --> 00:26:22.010 Jewish connected women are not the only

NOTE Confidence: 0.8384719

 $00:26:22.010 \longrightarrow 00:26:24.140$ ones who have this high prevalence.

NOTE Confidence: 0.8384719

00:26:24.140 --> 00:26:25.468 That there's certain population

NOTE Confidence: 0.8384719

 $00:26:25.468 \longrightarrow 00:26:26.796$ of women from Italy.

NOTE Confidence: 0.8384719

 $00:26:26.800 \longrightarrow 00:26:28.828$ There are certain population of Mexican

NOTE Confidence: 0.8384719

 $00{:}26{:}28.828 \dashrightarrow 00{:}26{:}30.544$ women that carries similarly high

NOTE Confidence: 0.8384719

 $00:26:30.544 \longrightarrow 00:26:32.743$ prevalence of these genes, so you know,

NOTE Confidence: 0.8384719

 $00{:}26{:}32.743 \dashrightarrow 00{:}26{:}35.760$ whereas years back we used to ask the woman,

NOTE Confidence: 0.8384719

00:26:35.760 --> 00:26:37.788 you know, are you Jewish Knesset

NOTE Confidence: 0.8384719

 $00:26:37.788 \longrightarrow 00:26:39.739$ descend and if she said no,

 $00:26:39.740 \longrightarrow 00:26:41.400$ we wouldn't worry as much.

NOTE Confidence: 0.8384719

 $00:26:41.400 \longrightarrow 00:26:43.060$ That's no longer the case.

NOTE Confidence: 0.8384719

 $00:26:43.060 \longrightarrow 00:26:44.056$ We know, again,

NOTE Confidence: 0.8384719

00:26:44.056 --> 00:26:45.716 much more about different mutations,

NOTE Confidence: 0.8384719

 $00:26:45.720 \longrightarrow 00:26:47.964$ different ethnicities and also we are

NOTE Confidence: 0.8384719

00:26:47.964 --> 00:26:50.656 much smarter Now we know many more genes

NOTE Confidence: 0.8384719

 $00:26:50.656 \longrightarrow 00:26:53.439$ now than we used to do years back and

NOTE Confidence: 0.8384719

 $00:26:53.439 \longrightarrow 00:26:55.826$ pathology as to exactly what kind of.

NOTE Confidence: 0.8384719

 $00:26:55.830 \longrightarrow 00:26:57.291$ Cells there are.

NOTE Confidence: 0.8384719

 $00:26:57.291 \longrightarrow 00:27:00.700$ And the jeans that we worry about,

NOTE Confidence: 0.8384719

 $00{:}27{:}00.700 \dashrightarrow 00{:}27{:}03.298$ you know a multiple so Bracco

NOTE Confidence: 0.8384719

 $00:27:03.298 \longrightarrow 00:27:04.597$ wanna bracket too?

NOTE Confidence: 0.8384719

 $00:27:04.600 \longrightarrow 00:27:07.656$ I'm sure many of you have heard of

NOTE Confidence: 0.8384719

 $00:27:07.656 \longrightarrow 00:27:10.679$ so Bracco Roca one stands for all

NOTE Confidence: 0.8384719

00:27:10.679 --> 00:27:13.892 breast cancer one clone in 90 four

NOTE Confidence: 0.8384719

 $00:27:13.892 \longrightarrow 00:27:16.754$ and increases risk of breast cancer,

 $00:27:16.760 \longrightarrow 00:27:20.708$ ovarian cancer and prostate cancer in males.

NOTE Confidence: 0.8384719

00:27:20.710 --> 00:27:23.248 Rock a tool for breast cancer.

NOTE Confidence: 0.8384719

 $00:27:23.250 \longrightarrow 00:27:24.098$ Two clones.

NOTE Confidence: 0.8384719

 $00:27:24.098 \longrightarrow 00:27:27.066$ Soon after that the 95 and carries

NOTE Confidence: 0.8384719

 $00:27:27.066 \longrightarrow 00:27:29.607$ lower risk but of more cancers.

NOTE Confidence: 0.8384719

00:27:29.610 --> 00:27:31.310 Breast cancer, brain cancer,

NOTE Confidence: 0.8384719

00:27:31.310 --> 00:27:32.160 prostate cancer,

NOTE Confidence: 0.8384719

00:27:32.160 --> 00:27:33.222 pancreatic cancer,

NOTE Confidence: 0.8384719

 $00:27:33.222 \longrightarrow 00:27:36.939$ and this is the cancer that's more

NOTE Confidence: 0.8384719

 $00{:}27{:}36.939 \dashrightarrow 00{:}27{:}39.549$ associated with male breast cancer.

NOTE Confidence: 0.8384719

 $00:27:39.550 \longrightarrow 00:27:41.950$ This is the life cancer risks.

NOTE Confidence: 0.8384719

 $00:27:41.950 \longrightarrow 00:27:43.306$ So in the population.

NOTE Confidence: 0.8384719

 $00{:}27{:}43.306 \dashrightarrow 00{:}27{:}46.749$ So if you don't have any genetic mutations,

NOTE Confidence: 0.8384719

00:27:46.750 --> 00:27:49.950 women have approximately 11 to 13% chance of

NOTE Confidence: 0.8384719

 $00:27:49.950 \longrightarrow 00:27:52.350$ getting breast cancer during their lifetime.

00:27:52.350 --> 00:27:53.758 But if you had,

NOTE Confidence: 0.8384719

 $00:27:53.758 \longrightarrow 00:27:56.750$ but if a woman has a bracket,

NOTE Confidence: 0.8384719

 $00:27:56.750 \longrightarrow 00:27:58.374$ one bracket, two mutation,

NOTE Confidence: 0.8384719

 $00:27:58.374 \longrightarrow 00:28:00.404$ that that risk is significantly

NOTE Confidence: 0.8384719

 $00:28:00.404 \longrightarrow 00:28:02.750$ higher simile for the ovarian cancer,

NOTE Confidence: 0.8384719

 $00:28:02.750 \longrightarrow 00:28:04.750$ the risk is approximately 1.4%,

NOTE Confidence: 0.8384719

00:28:04.750 --> 00:28:07.963 but could be as high as 60% for

NOTE Confidence: 0.8384719

 $00:28:07.963 \longrightarrow 00:28:10.028$ bracket one and his highest.

NOTE Confidence: 0.8384719

00:28:10.030 --> 00:28:13.236 40% for bracket two and their risk

NOTE Confidence: 0.8384719

 $00:28:13.236 \longrightarrow 00:28:15.573$ similarly is increased with second

NOTE Confidence: 0.8384719

 $00{:}28{:}15.573 \dashrightarrow 00{:}28{:}17.763$ breast cancer primary again up

NOTE Confidence: 0.8384719

 $00:28:17.763 \longrightarrow 00:28:20.448$ to 65% in bracket one patients.

NOTE Confidence: 0.659359146

 $00:28:23.640 \longrightarrow 00:28:26.660$ Um? So in prostate cancer,

NOTE Confidence: 0.659359146

00:28:26.660 --> 00:28:29.030 again is quite common in male,

NOTE Confidence: 0.659359146

 $00:28:29.030 \longrightarrow 00:28:31.310$ 16% of general population has a

NOTE Confidence: 0.659359146

00:28:31.310 --> 00:28:33.380 risk to develop prostate cancer,

 $00:28:33.380 \longrightarrow 00:28:36.540$ and the risk is as high as 30%.

NOTE Confidence: 0.659359146

 $00:28:36.540 \longrightarrow 00:28:39.207$ So doubled in Brock Obama bracket two

NOTE Confidence: 0.659359146

 $00:28:39.207 \longrightarrow 00:28:42.070$ males as well as male breast cancer,

NOTE Confidence: 0.659359146

00:28:42.070 --> 00:28:44.828 which is super super uncommon in general.

NOTE Confidence: 0.659359146

 $00:28:44.830 \longrightarrow 00:28:48.026$ Population could be as high as 10% with

NOTE Confidence: 0.659359146

 $00{:}28{:}48.026 \dashrightarrow 00{:}28{:}51.434$ bracket 2 and you can see similar increase

NOTE Confidence: 0.659359146

 $00:28:51.434 \longrightarrow 00:28:54.319$ with rocketu in pancreatic cancer.

NOTE Confidence: 0.659359146

 $00:28:54.320 \longrightarrow 00:28:57.400$ So what can we do?

NOTE Confidence: 0.659359146

 $00:28:57.400 \longrightarrow 00:28:59.500$ And this is we mentioned this

NOTE Confidence: 0.659359146

 $00:28:59.500 \longrightarrow 00:29:01.620$ in the beginning of the talk.

NOTE Confidence: 0.659359146

 $00:29:01.620 \longrightarrow 00:29:03.738$ So when we believe that patient,

NOTE Confidence: 0.659359146

 $00{:}29{:}03.740 \dashrightarrow 00{:}29{:}06.692$ a woman or male is a higher risk for

NOTE Confidence: 0.659359146

 $00:29:06.692 \longrightarrow 00:29:09.014$ specific cancer, what can be done?

NOTE Confidence: 0.659359146

00:29:09.014 --> 00:29:11.116 You know, I very frequently have

NOTE Confidence: 0.659359146

 $00:29:11.116 \longrightarrow 00:29:12.861$ this conversation in my office

00:29:12.861 --> 00:29:15.015 with women when they are reluctant

NOTE Confidence: 0.659359146

00:29:15.015 --> 00:29:16.760 to get genetic testing them,

NOTE Confidence: 0.659359146

 $00:29:16.760 \longrightarrow 00:29:19.576$ because very frequently there is fear is to.

NOTE Confidence: 0.659359146

 $00:29:19.580 \longrightarrow 00:29:21.925$ What would I do with this information

NOTE Confidence: 0.659359146

00:29:21.925 --> 00:29:24.860 if I know I have a genetic mutation?

NOTE Confidence: 0.659359146

 $00:29:24.860 \longrightarrow 00:29:26.364$ What does that do?

NOTE Confidence: 0.659359146

 $00:29:26.364 \longrightarrow 00:29:27.868$ Does it add anything?

NOTE Confidence: 0.659359146

00:29:27.870 --> 00:29:31.270 You know, does it help me at all?

NOTE Confidence: 0.659359146

 $00{:}29{:}31.270 \dashrightarrow 00{:}29{:}34.670$ And it certainly does, you know, I never.

NOTE Confidence: 0.659359146

00:29:34.670 --> 00:29:37.220 I never advocate free checking genes,

NOTE Confidence: 0.659359146

 $00{:}29{:}37.220 \dashrightarrow 00{:}29{:}39.804$ for which we have no no solution but

NOTE Confidence: 0.659359146

 $00:29:39.804 \longrightarrow 00:29:43.179$ for a great number of this variance

NOTE Confidence: 0.659359146

00:29:43.179 --> 00:29:45.299 in generic deleterious mutation,

NOTE Confidence: 0.659359146

00:29:45.300 --> 00:29:46.148 there's unquestionably

NOTE Confidence: 0.659359146

 $00:29:46.148 \longrightarrow 00:29:48.268$ prevention that can be done.

NOTE Confidence: 0.659359146

 $00{:}29{:}48.270 \dashrightarrow 00{:}29{:}50.400$ You know, knowledge is power,

 $00:29:50.400 \longrightarrow 00:29:53.676$ so the way that we usually look at this

NOTE Confidence: 0.659359146

 $00{:}29{:}53.676 {\:\dashrightarrow\:} 00{:}29{:}56.768$ kind of management is always similar,

NOTE Confidence: 0.659359146

 $00:29:56.770 \longrightarrow 00:29:59.530$ no matter what kind of cancer.

NOTE Confidence: 0.659359146

 $00:29:59.530 \longrightarrow 00:30:00.350$ We'll talk.

NOTE Confidence: 0.659359146

 $00:30:00.350 \longrightarrow 00:30:02.400$ About so the biggest one,

NOTE Confidence: 0.659359146

 $00:30:02.400 \longrightarrow 00:30:04.520$ and probably the easiest one,

NOTE Confidence: 0.659359146

 $00:30:04.520 \longrightarrow 00:30:06.220$ is the lifestyle modifications.

NOTE Confidence: 0.659359146

 $00:30:06.220 \longrightarrow 00:30:07.920$ Now the easiest one,

NOTE Confidence: 0.659359146

 $00:30:07.920 \longrightarrow 00:30:10.470$ as we'll talk a little bit,

NOTE Confidence: 0.659359146

 $00:30:10.470 \longrightarrow 00:30:12.790$ but but the cheapest usually

NOTE Confidence: 0.659359146

 $00:30:12.790 \longrightarrow 00:30:14.646$ chemoprevention surveillance and then

NOTE Confidence: 0.659359146

 $00:30:14.646 \longrightarrow 00:30:17.524$ the most aggressive one which is surgery

NOTE Confidence: 0.659359146

 $00{:}30{:}17.524 \dashrightarrow 00{:}30{:}19.819$ which is only reserved for truly,

NOTE Confidence: 0.659359146

00:30:19.820 --> 00:30:21.968 truly high risk population.

NOTE Confidence: 0.659359146

 $00:30:21.968 \longrightarrow 00:30:24.653$ So for the breast cancer,

 $00:30:24.660 \longrightarrow 00:30:26.835$ for those women who are

NOTE Confidence: 0.659359146

 $00{:}30{:}26.835 --> 00{:}30{:}28.140 \ {\rm significantly \ higher \ risk},$

NOTE Confidence: 0.659359146

 $00:30:28.140 \longrightarrow 00:30:31.178$ the most definitive but the most aggressive,

NOTE Confidence: 0.659359146

 $00:30:31.180 \longrightarrow 00:30:32.888$ of course, is mastectomy,

NOTE Confidence: 0.659359146

 $00:30:32.888 \longrightarrow 00:30:35.023$ and this one is reserved

NOTE Confidence: 0.659359146

 $00:30:35.023 \longrightarrow 00:30:37.270$ for women at highest risk,

NOTE Confidence: 0.659359146

 $00:30:37.270 \longrightarrow 00:30:39.445$ and it's very complex procedure

NOTE Confidence: 0.659359146

 $00:30:39.445 \longrightarrow 00:30:41.185$ reduces the risk substantially,

NOTE Confidence: 0.659359146

 $00:30:41.190 \longrightarrow 00:30:43.910$ but the psychosocial implications

NOTE Confidence: 0.659359146

 $00:30:43.910 \longrightarrow 00:30:46.630$ and that will study.

NOTE Confidence: 0.659359146

 $00:30:46.630 \longrightarrow 00:30:49.510$ We know that even for women

NOTE Confidence: 0.659359146

00:30:49.510 --> 00:30:50.950 with BRCA mutations,

NOTE Confidence: 0.659359146

00:30:50.950 --> 00:30:52.998 when they undergo mastectomy,

NOTE Confidence: 0.659359146

00:30:52.998 --> 00:30:55.558 zero percent of women actually

NOTE Confidence: 0.659359146

00:30:55.558 --> 00:30:57.841 ended up having breast cancer

NOTE Confidence: 0.659359146

 $00:30:57.841 \longrightarrow 00:31:03.290$ compared to 7% of those who did not.

 $00:31:03.290 \longrightarrow 00:31:03.685$ Surveillance,

NOTE Confidence: 0.659359146

 $00{:}31{:}03.685 \dashrightarrow 00{:}31{:}06.055$ which is just means closer watching

NOTE Confidence: 0.659359146

 $00:31:06.055 \longrightarrow 00:31:08.313$ is consists of clinical breast exams

NOTE Confidence: 0.659359146

 $00:31:08.313 \longrightarrow 00:31:11.066$ and you know right now there's a lot

NOTE Confidence: 0.659359146

 $00:31:11.066 \longrightarrow 00:31:13.178$ of debate in the literature where

NOTE Confidence: 0.659359146

00:31:13.178 --> 00:31:15.700 breast exams should be done by providers,

NOTE Confidence: 0.659359146

 $00:31:15.700 \longrightarrow 00:31:17.525$ so not for this population.

NOTE Confidence: 0.659359146

 $00:31:17.530 \longrightarrow 00:31:19.350$ We continue to encourage it.

NOTE Confidence: 0.659359146

00:31:19.350 --> 00:31:21.540 Self breast exams again very important,

NOTE Confidence: 0.659359146

 $00{:}31{:}21.540 \dashrightarrow 00{:}31{:}23.365$ especially for women to know

NOTE Confidence: 0.659359146

00:31:23.365 --> 00:31:25.190 where their breasts feel like,

NOTE Confidence: 0.659359146

 $00:31:25.190 \longrightarrow 00:31:27.464$ so that if anything feels abnormal

NOTE Confidence: 0.659359146

 $00{:}31{:}27.464 \dashrightarrow 00{:}31{:}30.526$ they will be aware of it or offer it

NOTE Confidence: 0.659359146

 $00:31:30.526 \dashrightarrow 00:31:32.860$ breast MRI's as well as mammograms.

NOTE Confidence: 0.659359146

 $00:31:32.860 \longrightarrow 00:31:35.146$ And that starts at age 25.

00:31:35.150 --> 00:31:37.684 For women who are truly at high

NOTE Confidence: 0.659359146

 $00:31:37.684 \longrightarrow 00:31:40.240$ risk because of genetic mutations.

NOTE Confidence: 0.659359146

00:31:40.240 --> 00:31:41.464 MRI's are very debatable.

NOTE Confidence: 0.659359146

00:31:41.464 --> 00:31:44.642 For those of you who get him, you know it's.

NOTE Confidence: 0.659359146

 $00:31:44.642 \longrightarrow 00:31:46.706$ It's always a battle with insurance

NOTE Confidence: 0.659359146

 $00:31:46.706 \longrightarrow 00:31:48.200$ companies to try to prove it.

NOTE Confidence: 0.659359146

 $00:31:48.200 \longrightarrow 00:31:50.640$ This is not meant to replace the mammogram.

NOTE Confidence: 0.848147

 $00:31:50.640 \longrightarrow 00:31:52.228$ Mammogram looks at things

NOTE Confidence: 0.848147

 $00{:}31{:}52.228 \dashrightarrow 00{:}31{:}54.610$ differently and there's a lot of

NOTE Confidence: 0.848147

 $00:31:54.687 \longrightarrow 00:31:56.949$ benefit to the mammogram as well.

NOTE Confidence: 0.848147

 $00{:}31{:}56.950 \dashrightarrow 00{:}31{:}58.708$ It's not proven to impact survival,

NOTE Confidence: 0.848147

 $00:31:58.710 \longrightarrow 00:32:00.558$ and that's why it's so hard to

NOTE Confidence: 0.848147

00:32:00.558 --> 00:32:01.950 prove my insurance companies,

NOTE Confidence: 0.848147

 $00:32:01.950 \longrightarrow 00:32:04.116$ but nevertheless it adds to the

NOTE Confidence: 0.848147

 $00:32:04.116 \longrightarrow 00:32:06.055$ full picture and we recommend

NOTE Confidence: 0.848147

 $00:32:06.055 \longrightarrow 00:32:08.175$ getting it for this woman.

 $00:32:08.180 \longrightarrow 00:32:11.190$ Chemoprevention is a little bit more complex.

NOTE Confidence: 0.848147

 $00{:}32{:}11.190 \dashrightarrow 00{:}32{:}13.605$ Again, this is for women at higher

NOTE Confidence: 0.848147

 $00:32:13.605 \longrightarrow 00:32:15.759$ risk and the medicines that

NOTE Confidence: 0.848147

00:32:15.759 --> 00:32:18.364 are recommended as these risk

NOTE Confidence: 0.848147

 $00:32:18.364 \longrightarrow 00:32:20.406$ reduction agents tamoxifen are

NOTE Confidence: 0.848147

 $00:32:20.406 \longrightarrow 00:32:22.794$ almost in an investor and there's,

NOTE Confidence: 0.848147

 $00:32:22.800 \longrightarrow 00:32:25.380$ you know, there's no free lunch.

NOTE Confidence: 0.848147

 $00:32:25.380 \longrightarrow 00:32:28.390$ So there's some side effects to them.

NOTE Confidence: 0.848147

 $00:32:28.390 \longrightarrow 00:32:31.400$ So this similarly is reserved for women

NOTE Confidence: 0.848147

 $00:32:31.400 \longrightarrow 00:32:34.451$ at significant risk for women who are

NOTE Confidence: 0.848147

 $00{:}32{:}34.451 \dashrightarrow 00{:}32{:}36.983$ significant risk who take this medicine,

NOTE Confidence: 0.848147

 $00:32:36.990 \longrightarrow 00:32:39.618$ they decrease their risk by good.

NOTE Confidence: 0.848147

00:32:39.620 --> 00:32:42.608 50% so the benefit is substantial.

NOTE Confidence: 0.8473329

 $00{:}32{:}45.300 \dashrightarrow 00{:}32{:}47.088$ Ask you for a little bit.

NOTE Confidence: 0.8473329

 $00:32:47.090 \longrightarrow 00:32:48.872$ This is just how these medicines

 $00:32:48.872 \longrightarrow 00:32:50.580$ work and again, some of them,

NOTE Confidence: 0.8473329

 $00:32:50.580 \longrightarrow 00:32:51.930$ all of them decrease the

NOTE Confidence: 0.8473329

 $00:32:51.930 \longrightarrow 00:32:53.350$ risk of breast cancer,

NOTE Confidence: 0.8473329

 $00:32:53.350 \longrightarrow 00:32:56.023$ but some of them are good for the bones.

NOTE Confidence: 0.8473329

 $00:32:56.030 \longrightarrow 00:32:58.703$ Some of them are not good for the bones.

NOTE Confidence: 0.8473329

 $00:32:58.710 \longrightarrow 00:33:01.086$ Some of them are good for the uterus,

NOTE Confidence: 0.8473329

 $00:33:01.090 \longrightarrow 00:33:01.990$ others are not.

NOTE Confidence: 0.8621618

 $00:33:04.560 \longrightarrow 00:33:07.760$ And this is to show that in all

NOTE Confidence: 0.8621618

 $00:33:07.760 \longrightarrow 00:33:10.633$ these women in women who have

NOTE Confidence: 0.8621618

00:33:10.633 --> 00:33:13.591 mutations and who have higher risk,

NOTE Confidence: 0.8621618

 $00:33:13.600 \longrightarrow 00:33:15.550$ tamoxifen significantly decrease

NOTE Confidence: 0.8621618

 $00:33:15.550 \longrightarrow 00:33:18.800$ the risk of breast cancer.

NOTE Confidence: 0.8621618

 $00:33:18.800 \longrightarrow 00:33:22.153$ As I mentioned, the free lunch side

NOTE Confidence: 0.8621618

00:33:22.153 --> 00:33:25.048 effects of tamoxifen are hot flashes,

NOTE Confidence: 0.8621618

 $00:33:25.050 \longrightarrow 00:33:26.445$ some leg cramps.

NOTE Confidence: 0.8621618

 $00:33:26.445 \longrightarrow 00:33:30.340$ There's a very small risk of blood clots.

00:33:30.340 --> 00:33:33.226 Very small risk of individual cancer,

NOTE Confidence: 0.8621618

 $00:33:33.230 \longrightarrow 00:33:34.190$ and cataracts.

NOTE Confidence: 0.85178745

 $00:33:36.330 \longrightarrow 00:33:38.490$ The the easiest as I mentioned.

NOTE Confidence: 0.85178745

 $00:33:38.490 \longrightarrow 00:33:39.930$ Well not the easiest,

NOTE Confidence: 0.85178745

 $00:33:39.930 \longrightarrow 00:33:41.730$ but the most straightforward one,

NOTE Confidence: 0.85178745

 $00:33:41.730 \longrightarrow 00:33:43.530$ of course, is lifestyle modifications,

NOTE Confidence: 0.85178745

 $00:33:43.530 \longrightarrow 00:33:46.410$ and we do a lot of those conversations.

NOTE Confidence: 0.85178745

 $00:33:46.410 \longrightarrow 00:33:48.210$ The biggest one is alcohol.

NOTE Confidence: 0.85178745

 $00{:}33{:}48.210 \dashrightarrow 00{:}33{:}50.541$ I'm sure you guys have seen the

NOTE Confidence: 0.85178745

 $00:33:50.541 \longrightarrow 00:33:52.377$ literature that there is definitely

NOTE Confidence: 0.85178745

 $00:33:52.377 \longrightarrow 00:33:54.687$ correlation of of high alcohol use.

NOTE Confidence: 0.85178745

 $00{:}33{:}54.690 \dashrightarrow 00{:}33{:}56.490$ Higher alcohol use to increase

NOTE Confidence: 0.85178745

 $00{:}33{:}56.490 \dashrightarrow 00{:}33{:}57.930$ risk of breast cancer.

NOTE Confidence: 0.85178745

 $00:33:57.930 \longrightarrow 00:34:00.261$ Women who drink one to two drinks

NOTE Confidence: 0.85178745

 $00:34:00.261 \longrightarrow 00:34:02.933$ a day is associated with 30 to

 $00:34:02.933 \longrightarrow 00:34:05.254$ 50% increase in breast cancer.

NOTE Confidence: 0.85178745

 $00{:}34{:}05.254 \dashrightarrow 00{:}34{:}07.659$ So usually the recommendation is

NOTE Confidence: 0.85178745

 $00:34:07.659 \longrightarrow 00:34:10.624$ to have less than one drink a day,

NOTE Confidence: 0.85178745

 $00:34:10.630 \longrightarrow 00:34:11.851$ so it's manageable.

NOTE Confidence: 0.85178745

 $00:34:11.851 \longrightarrow 00:34:15.570$ So less than 7 drinks a week and it

NOTE Confidence: 0.85178745

00:34:15.570 --> 00:34:19.120 actually doesn't matter if you do all 7 one.

NOTE Confidence: 0.85178745

00:34:19.120 --> 00:34:21.934 So if you do once every day,

NOTE Confidence: 0.85178745

 $00:34:21.940 \longrightarrow 00:34:24.364$ the total should be less than

NOTE Confidence: 0.85178745

 $00:34:24.364 \longrightarrow 00:34:25.980$ that and then wait.

NOTE Confidence: 0.85178745

 $00:34:25.980 \longrightarrow 00:34:27.890$ There's a very specific correlation

NOTE Confidence: 0.85178745

 $00{:}34{:}27.890 \dashrightarrow 00{:}34{:}30.830$ of weight to risk of breast cancer.

NOTE Confidence: 0.85178745

 $00:34:30.830 \longrightarrow 00:34:32.610$ So especially after menopause,

NOTE Confidence: 0.85178745

 $00:34:32.610 \longrightarrow 00:34:36.010$ women with a BMI of more than 33.

NOTE Confidence: 0.85178745

00:34:36.010 --> 00:34:38.656 Had 27% increase risk versus women

NOTE Confidence: 0.85178745

 $00:34:38.656 \longrightarrow 00:34:42.310$ would be in my of 21 or less and

NOTE Confidence: 0.85178745

00:34:42.310 --> 00:34:44.668 we know from the North Nurses

00:34:44.668 --> 00:34:47.944 Health Study is study from which we

NOTE Confidence: 0.85178745

 $00:34:47.944 \longrightarrow 00:34:50.568$ learned a lot about these cancers.

NOTE Confidence: 0.85178745

00:34:50.568 --> 00:34:53.100 Then 10 kilogram weight gain since

NOTE Confidence: 0.85178745

00:34:53.173 --> 00:34:56.174 menopause had almost 20% higher risk of

NOTE Confidence: 0.85178745

 $00:34:56.174 \longrightarrow 00:34:58.742$ breast cancer compared to waive maintenance.

NOTE Confidence: 0.85178745

 $00:34:58.750 \longrightarrow 00:35:00.890$ So as lifestyle modifications go,

NOTE Confidence: 0.85178745

 $00:35:00.890 \longrightarrow 00:35:03.660$ alcohol and then achieving and

NOTE Confidence: 0.85178745

 $00:35:03.660 \longrightarrow 00:35:06.430$ maintaining a healthy weight of

NOTE Confidence: 0.85178745

 $00{:}35{:}06.526 \dashrightarrow 00{:}35{:}09.206$ the two most important aspect.

NOTE Confidence: 0.85178745

 $00:35:09.210 \longrightarrow 00:35:13.080$ I won't spend too long.

NOTE Confidence: 0.85178745

 $00{:}35{:}13.080 \dashrightarrow 00{:}35{:}15.264$ But there's of course pluses and

NOTE Confidence: 0.85178745

 $00:35:15.264 \longrightarrow 00:35:17.240$ minuses of hormone replacement therapy.

NOTE Confidence: 0.85178745

00:35:17.240 --> 00:35:18.347 As you know,

NOTE Confidence: 0.85178745

 $00:35:18.347 \longrightarrow 00:35:20.561$ we used a hormone replacement therapy

NOTE Confidence: 0.85178745

 $00:35:20.561 \longrightarrow 00:35:23.536$ used to be something that women used to

 $00:35:23.536 \longrightarrow 00:35:26.310$ get routinely until the study was published.

NOTE Confidence: 0.85178745

00:35:26.310 --> 00:35:27.886 The Women's Health Initiative,

NOTE Confidence: 0.85178745

 $00:35:27.886 \longrightarrow 00:35:29.856$ the nurses study that showed

NOTE Confidence: 0.85178745

 $00:35:29.856 \longrightarrow 00:35:31.976$ that there was a substantial 26%

NOTE Confidence: 0.85178745

 $00:35:31.980 \longrightarrow 00:35:33.420$ increase in breast cancer,

NOTE Confidence: 0.85178745

 $00:35:33.420 \longrightarrow 00:35:36.140$ and that's when all the hormones stopped,

NOTE Confidence: 0.85178745

00:35:36.140 --> 00:35:38.025 even though we don't think

NOTE Confidence: 0.85178745

 $00:35:38.025 \longrightarrow 00:35:39.533$ that's really the case.

NOTE Confidence: 0.85178745

 $00{:}35{:}39.540 {\:{\mbox{--}}\!>}\ 00{:}35{:}41.505$ You know some subsequent studies

NOTE Confidence: 0.85178745

 $00:35:41.505 \longrightarrow 00:35:43.470$ that were done show that.

NOTE Confidence: 0.85178745

 $00{:}35{:}43.470 \dashrightarrow 00{:}35{:}45.520$ When used with estrogen alone,

NOTE Confidence: 0.85178745

 $00:35:45.520 \longrightarrow 00:35:47.560$ there really was no increase

NOTE Confidence: 0.85178745

 $00:35:47.560 \longrightarrow 00:35:48.784$ in breast cancer,

NOTE Confidence: 0.85178745

00:35:48.790 --> 00:35:51.359 so nowadays we truly believe that this

NOTE Confidence: 0.85178745

00:35:51.359 --> 00:35:54.178 is a shared kind of very personalized

NOTE Confidence: 0.85178745

 $00:35:54.178 \longrightarrow 00:35:57.380$ decision between a woman and a provider.

 $00{:}35{:}57.380 \dashrightarrow 00{:}35{:}59.008$ Understanding risks and benefits.

NOTE Confidence: 0.83015347

 $00:36:01.330 \longrightarrow 00:36:03.724$ And after the women will be RC

NOTE Confidence: 0.83015347

00:36:03.724 --> 00:36:05.290 mutation undergo definitive surgery.

NOTE Confidence: 0.83015347

 $00:36:05.290 \longrightarrow 00:36:07.522$ So if the women and we'll

NOTE Confidence: 0.83015347

 $00:36:07.522 \longrightarrow 00:36:09.610$ talk about that in a bit.

NOTE Confidence: 0.83015347

 $00:36:09.610 \longrightarrow 00:36:12.346$ If the women, if they are always in

NOTE Confidence: 0.83015347

 $00:36:12.346 \longrightarrow 00:36:15.009$ tubes are removed at a younger age,

NOTE Confidence: 0.83015347

 $00:36:15.010 \longrightarrow 00:36:17.110$ there's a lot of literature that supports

NOTE Confidence: 0.83015347

 $00:36:17.110 \longrightarrow 00:36:19.689$ the use of hormone replacement therapy.

NOTE Confidence: 0.83015347

 $00:36:19.690 \longrightarrow 00:36:22.238$ In this women it is completely safe

NOTE Confidence: 0.83015347

 $00:36:22.238 \longrightarrow 00:36:25.075$ and it still decreases the risk of

NOTE Confidence: 0.83015347

 $00:36:25.075 \longrightarrow 00:36:27.577$ breast cancer by his highest 50%.

NOTE Confidence: 0.83015347

 $00{:}36{:}27.580 \dashrightarrow 00{:}36{:}30.590$ And that's all been very well studied.

NOTE Confidence: 0.83015347

 $00:36:30.590 \longrightarrow 00:36:33.348$ I'm going to jump briefly for the

NOTE Confidence: 0.83015347

00:36:33.348 --> 00:36:36.602 next few minutes to now the risk

 $00:36:36.602 \longrightarrow 00:36:39.087$ management ovarian cancer Doctor Wong

NOTE Confidence: 0.83015347

00:36:39.087 --> 00:36:42.064 mentioned this already, but you know,

NOTE Confidence: 0.83015347

 $00:36:42.064 \longrightarrow 00:36:44.354$ we do very similar approach,

NOTE Confidence: 0.83015347

00:36:44.360 --> 00:36:44.820 surveillance,

NOTE Confidence: 0.83015347

00:36:44.820 --> 00:36:46.660 chemoprevention or prophylactic surgery,

NOTE Confidence: 0.83015347

 $00{:}36{:}46.660 \dashrightarrow 00{:}36{:}50.968$ which again is the most aggressive.

NOTE Confidence: 0.83015347

 $00:36:50.970 \longrightarrow 00:36:54.300$ Ovarian cancer remains unfortunately deadly.

NOTE Confidence: 0.83015347

 $00:36:54.300 \longrightarrow 00:36:57.620$ 22,000 cases year, 15,000 deaths.

NOTE Confidence: 0.83015347

00:36:57.620 --> 00:36:58.285 Unfortunately,

NOTE Confidence: 0.83015347

 $00:36:58.285 \longrightarrow 00:37:02.275$ in comparison to the breast cancer,

NOTE Confidence: 0.83015347

 $00:37:02.280 \longrightarrow 00:37:07.150$ which is the most common?

NOTE Confidence: 0.83015347

00:37:07.150 --> 00:37:07.860 But much,

NOTE Confidence: 0.83015347

 $00{:}37{:}07.860 \dashrightarrow 00{:}37{:}10.345$ much more curable and the trouble with

NOTE Confidence: 0.83015347

 $00:37:10.345 \dashrightarrow 00:37:13.245$ that is that as as again many of you know,

NOTE Confidence: 0.83015347

 $00:37:13.250 \longrightarrow 00:37:14.850$ there will be any cancer.

NOTE Confidence: 0.83015347

 $00:37:14.850 \longrightarrow 00:37:16.776$ Fortunately, it's the cancer that whispers,

 $00:37:16.780 \longrightarrow 00:37:18.385$ even though we actually don't

NOTE Confidence: 0.83015347

 $00{:}37{:}18.385 \dashrightarrow 00{:}37{:}19.990$ think it's the case anymore.

NOTE Confidence: 0.83015347

 $00:37:19.990 \longrightarrow 00:37:21.916$ We now do not think there

NOTE Confidence: 0.83015347

 $00:37:21.916 \longrightarrow 00:37:22.879$ are varying cancers.

NOTE Confidence: 0.83015347

 $00:37:22.880 \longrightarrow 00:37:23.528$ With spring,

NOTE Confidence: 0.83015347

 $00:37:23.528 \longrightarrow 00:37:25.796$ we really just think that nobody is

NOTE Confidence: 0.83015347

 $00:37:25.796 \longrightarrow 00:37:27.690$ listening over the past couple years.

NOTE Confidence: 0.83015347

 $00:37:27.690 \longrightarrow 00:37:29.671$ There's been a lot of studies that

NOTE Confidence: 0.83015347

00:37:29.671 --> 00:37:31.663 showed that even though great majority

NOTE Confidence: 0.83015347

00:37:31.663 --> 00:37:33.468 of women with advanced cancer,

NOTE Confidence: 0.83015347

 $00:37:33.470 \longrightarrow 00:37:35.717$ stage three and stage four had symptoms,

NOTE Confidence: 0.83015347

 $00:37:35.720 \longrightarrow 00:37:37.706$ women with stage one and two.

NOTE Confidence: 0.83015347

 $00{:}37{:}37.710 \dashrightarrow 00{:}37{:}40.308$ Great majority of them also had

NOTE Confidence: 0.83015347

 $00:37:40.308 \longrightarrow 00:37:42.953$ symptoms issues that the symptoms were

NOTE Confidence: 0.83015347

 $00:37:42.953 \longrightarrow 00:37:45.872$ so vague that they were perceived by

 $00:37:45.872 \longrightarrow 00:37:48.552$ the woman and also by her providers

NOTE Confidence: 0.83015347

 $00:37:48.552 \longrightarrow 00:37:50.830$ to be normal to be menopausal,

NOTE Confidence: 0.83015347

 $00:37:50.830 \longrightarrow 00:37:52.060$ to be hormonal,

NOTE Confidence: 0.83015347

 $00:37:52.060 \longrightarrow 00:37:52.898$ you know,

NOTE Confidence: 0.83015347

 $00:37:52.898 \longrightarrow 00:37:55.831$ to be just the normal thing that

NOTE Confidence: 0.83015347

 $00:37:55.831 \longrightarrow 00:37:57.388$ women in the goal,

NOTE Confidence: 0.83015347

 $00:37:57.390 \longrightarrow 00:38:00.142$ which is of course not the case so

NOTE Confidence: 0.83015347

 $00:38:00.142 \longrightarrow 00:38:03.471$ so much of what we do with these

NOTE Confidence: 0.83015347

 $00{:}38{:}03.471 \dashrightarrow 00{:}38{:}06.197$ symptoms is educating women and and

NOTE Confidence: 0.83015347

00:38:06.197 --> 00:38:08.537 advocating and teaching them to.

NOTE Confidence: 0.83015347

 $00{:}38{:}08.540 \dashrightarrow 00{:}38{:}10.820$ Listen to your body that as that the

NOTE Confidence: 0.83015347

 $00:38:10.820 \longrightarrow 00:38:13.435$ Wong said that if you have these symptoms,

NOTE Confidence: 0.83015347

 $00:38:13.440 \longrightarrow 00:38:14.376$ the bowel symptoms,

NOTE Confidence: 0.83015347

00:38:14.376 --> 00:38:15.936 the bladder symptoms then just

NOTE Confidence: 0.83015347

00:38:15.936 --> 00:38:17.795 not feeling great and having some

NOTE Confidence: 0.83015347

 $00{:}38{:}17.795 \dashrightarrow 00{:}38{:}19.275$ some bloating and distention and

 $00:38:19.275 \longrightarrow 00:38:21.090$ your clothes are not feeling well.

NOTE Confidence: 0.83015347

 $00{:}38{:}21.090 \dashrightarrow 00{:}38{:}23.530$ And of course we all have those symptoms.

NOTE Confidence: 0.83015347

 $00:38:23.530 \longrightarrow 00:38:25.567$ All of us feel that the difference

NOTE Confidence: 0.83015347

 $00:38:25.567 \longrightarrow 00:38:27.780$ between what we all feel and the

NOTE Confidence: 0.83015347

 $00{:}38{:}27.780 \dashrightarrow 00{:}38{:}29.700$ symptoms that are actually abnormal is

NOTE Confidence: 0.83015347

00:38:29.762 --> 00:38:31.799 a women who ended up having cancer.

NOTE Confidence: 0.83015347

00:38:31.800 --> 00:38:33.715 Had these symptoms every single

NOTE Confidence: 0.83015347

 $00:38:33.715 \longrightarrow 00:38:35.247$ day for two weeks.

NOTE Confidence: 0.83015347

 $00:38:35.250 \longrightarrow 00:38:37.146$ So we do a lot of advocacy work

NOTE Confidence: 0.83015347

00:38:37.146 --> 00:38:39.360 and a lot of empowering of women

NOTE Confidence: 0.83015347

 $00:38:39.360 \longrightarrow 00:38:41.030$ to listen to your bodies.

NOTE Confidence: 0.83015347

 $00:38:41.030 \longrightarrow 00:38:43.334$ And when you feel that something is wrong,

NOTE Confidence: 0.83015347

 $00{:}38{:}43.340 \dashrightarrow 00{:}38{:}45.572$ you you present to to the provider and

NOTE Confidence: 0.83015347

 $00:38:45.572 \longrightarrow 00:38:47.680$ you demand the care that you deserve.

NOTE Confidence: 0.83015347

00:38:47.680 --> 00:38:50.272 You know you don't take no for an answer.

 $00:38:50.280 \longrightarrow 00:38:52.114$ You don't let the provider tell you

NOTE Confidence: 0.83015347

 $00{:}38{:}52.114 \dashrightarrow 00{:}38{:}53.871$ that you know these symptoms are

NOTE Confidence: 0.83015347

 $00:38:53.871 \longrightarrow 00:38:55.701$ normal and just it's menopause that

NOTE Confidence: 0.83015347

 $00:38:55.701 \longrightarrow 00:38:57.505$ if you continue having these symptoms

NOTE Confidence: 0.83015347

 $00:38:57.505 \longrightarrow 00:39:00.760$ that you need to be evaluated.

NOTE Confidence: 0.83015347 00:39:00.760 --> 00:39:02.920 I'm. NOTE Confidence: 0.83015347

 $00:39:02.920 \longrightarrow 00:39:04.576$ And this is like I mentioned,

NOTE Confidence: 0.83015347

 $00:39:04.580 \longrightarrow 00:39:06.484$ those those are the symptoms that we

NOTE Confidence: 0.83015347

 $00{:}39{:}06.484 \to 00{:}39{:}08.750$ met the woman feel, and that it's so,

NOTE Confidence: 0.83015347

 $00:39:08.750 \longrightarrow 00:39:10.430$ so important to be aware of

NOTE Confidence: 0.86379963 00:39:10.493 --> 00:39:10.680 it. NOTE Confidence: 0.8243944

 $00:39:13.850 \longrightarrow 00:39:16.088$ The trouble with with varying cancer

NOTE Confidence: 0.8243944

 $00:39:16.088 \longrightarrow 00:39:18.877$ in the symptoms is that there's a lot

NOTE Confidence: 0.8243944

 $00{:}39{:}18.877 \dashrightarrow 00{:}39{:}21.260$ that mimics a lot of other things.

NOTE Confidence: 0.8243944

 $00:39:21.260 \longrightarrow 00:39:23.025$ You know, it makes endometriosis

NOTE Confidence: 0.8243944

 $00:39:23.025 \longrightarrow 00:39:24.790$ the most common mimic it,

00:39:24.790 --> 00:39:26.202 mimics irritable bowel syndrome,

NOTE Confidence: 0.8243944

 $00:39:26.202 \longrightarrow 00:39:27.261$ inflammatory disease and

NOTE Confidence: 0.8243944

 $00:39:27.261 \longrightarrow 00:39:27.967$ interstitial cystitis,

NOTE Confidence: 0.8243944

 $00{:}39{:}27.970 \dashrightarrow 00{:}39{:}30.224$ and that's why at times it's a

NOTE Confidence: 0.8243944

 $00:39:30.224 \longrightarrow 00:39:32.209$ little bit difficult to distinguish.

NOTE Confidence: 0.8243944

00:39:32.210 --> 00:39:34.337 But the most important thing, again,

NOTE Confidence: 0.8243944

 $00:39:34.337 \longrightarrow 00:39:37.273$ is just to know that this is something

NOTE Confidence: 0.8243944

 $00:39:37.273 \longrightarrow 00:39:40.323$ that's not that's not same for you as usual.

NOTE Confidence: 0.8243944

 $00:39:40.330 \longrightarrow 00:39:42.436$ So when women have these symptoms,

NOTE Confidence: 0.8243944

 $00:39:42.440 \longrightarrow 00:39:44.960$ it's very important to be seen.

NOTE Confidence: 0.8243944

 $00:39:44.960 \dashrightarrow 00:39:47.634$ Many women with this kind of symptoms

NOTE Confidence: 0.8243944

 $00:39:47.634 \longrightarrow 00:39:49.647$ actually not seen by gynecologist

NOTE Confidence: 0.8243944

00:39:49.647 --> 00:39:52.405 they seen by GI personal Gu person,

NOTE Confidence: 0.8243944

 $00:39:52.410 \longrightarrow 00:39:55.217$ you know actually the most common doctors

NOTE Confidence: 0.8243944

 $00:39:55.217 \longrightarrow 00:39:58.790$ who see women at this stage are guessing

 $00:39:58.790 \longrightarrow 00:40:01.085$ TRA la just urologists chiropractor.

NOTE Confidence: 0.8243944

 $00:40:01.090 \longrightarrow 00:40:03.496$ And psychologists, that's what that was.

NOTE Confidence: 0.8243944

 $00:40:03.500 \longrightarrow 00:40:04.300$ Number 4.

NOTE Confidence: 0.8243944

 $00:40:04.300 \longrightarrow 00:40:06.300$ And then these women always.

NOTE Confidence: 0.8243944

 $00:40:06.300 \longrightarrow 00:40:09.037$ It's very important for them to have

NOTE Confidence: 0.8243944

00:40:09.037 --> 00:40:11.519 a sonogram and some blood work,

NOTE Confidence: 0.8243944

 $00:40:11.520 \longrightarrow 00:40:13.926$ and sometimes that CAT scan and

NOTE Confidence: 0.8243944

 $00:40:13.926 \longrightarrow 00:40:15.530$ then referral to gynecologist,

NOTE Confidence: 0.8243944

00:40:15.530 --> 00:40:18.830 which is very important.

NOTE Confidence: 0.8243944

 $00:40:18.830 \longrightarrow 00:40:19.340 \text{ Um}$?

NOTE Confidence: 0.832056

00:40:21.610 --> 00:40:23.710 Sorry bout that you guys needed

NOTE Confidence: 0.832056

 $00{:}40{:}23.710 \dashrightarrow 00{:}40{:}26.762$ beauty of of zoom so we don't do

NOTE Confidence: 0.832056

 $00:40:26.762 \longrightarrow 00:40:28.334$ screening for varying cancer.

NOTE Confidence: 0.832056

 $00{:}40{:}28.340 --> 00{:}40{:}29.744$ It doesn't really work.

NOTE Confidence: 0.832056

 $00:40:29.744 \longrightarrow 00:40:32.460$ See what 25 is a tumor marker?

NOTE Confidence: 0.832056

 $00{:}40{:}32.460 \dashrightarrow 00{:}40{:}34.632$ That's just not a great tumor

 $00:40:34.632 \longrightarrow 00:40:37.457$ marker for this scene with 25 is a

NOTE Confidence: 0.832056

 $00{:}40{:}37.457 \dashrightarrow 00{:}40{:}39.413$ very good to market and something

NOTE Confidence: 0.832056

 $00:40:39.490 \longrightarrow 00:40:42.004$ that we use very carefully very

NOTE Confidence: 0.832056

 $00:40:42.004 \longrightarrow 00:40:44.054$ closely for surveillance of cancer.

NOTE Confidence: 0.832056

 $00:40:44.054 \longrightarrow 00:40:45.550$ But we do not.

NOTE Confidence: 0.832056

 $00:40:45.550 \longrightarrow 00:40:48.154$ It does not work great by itself,

NOTE Confidence: 0.832056

 $00:40:48.160 \longrightarrow 00:40:51.584$ so we used it together with an ultrasound.

NOTE Confidence: 0.832056

 $00:40:51.590 \longrightarrow 00:40:52.554$ Before hand.

NOTE Confidence: 0.832056

 $00:40:52.554 \longrightarrow 00:40:55.928$ And this is just studies that show

NOTE Confidence: 0.832056

 $00:40:55.928 \longrightarrow 00:40:58.962$ that together with it with an

NOTE Confidence: 0.832056

00:40:58.962 --> 00:41:01.980 ultrasound for women at high risk.

NOTE Confidence: 0.832056

00:41:01.980 --> 00:41:02.706 Using imaging,

NOTE Confidence: 0.832056

 $00:41:02.706 \longrightarrow 00:41:04.521$ which is ultrasound together with

NOTE Confidence: 0.832056

 $00:41:04.521 \longrightarrow 00:41:06.934$ the blood test, is the best modality.

NOTE Confidence: 0.832056

00:41:06.934 --> 00:41:10.329 Best way to try to find this cancer early?

 $00:41:13.130 \longrightarrow 00:41:14.936$ And then of course, the most.

NOTE Confidence: 0.80238247

 $00{:}41{:}17.100 \dashrightarrow 00{:}41{:}19.302$ The most aggressive one which is

NOTE Confidence: 0.80238247

 $00:41:19.302 \longrightarrow 00:41:21.260$ surgery and surgery for prophylaxis

NOTE Confidence: 0.80238247

 $00:41:21.260 \longrightarrow 00:41:23.780$ for varying cancer is really only

NOTE Confidence: 0.80238247

 $00:41:23.780 \longrightarrow 00:41:26.090$ reserved for women at higher risk.

NOTE Confidence: 0.80238247

 $00:41:26.090 \longrightarrow 00:41:28.436$ So who are the women who?

NOTE Confidence: 0.80238247

 $00:41:28.440 \longrightarrow 00:41:31.135$ What are the factors that are associated

NOTE Confidence: 0.80238247

 $00:41:31.135 \longrightarrow 00:41:33.798$ with high risk of ovarian cancer and

NOTE Confidence: 0.80238247

 $00{:}41{:}33.798 \dashrightarrow 00{:}41{:}36.650$ those are women who had early minarchy.

NOTE Confidence: 0.80238247

00:41:36.650 --> 00:41:38.610 Late menopause never had children,

NOTE Confidence: 0.80238247

 $00{:}41{:}38.610 \dashrightarrow 00{:}41{:}40.174$ infertility and Dimitriou Sis,

NOTE Confidence: 0.80238247

 $00:41:40.174 \longrightarrow 00:41:42.520$ and then the most serious ones,

NOTE Confidence: 0.80238247

 $00:41:42.520 \longrightarrow 00:41:45.095$ which are the genetic factors

NOTE Confidence: 0.80238247

 $00:41:45.095 \longrightarrow 00:41:48.310$ bracket one bracket two and Lynch.

NOTE Confidence: 0.80238247

 $00:41:48.310 \longrightarrow 00:41:49.690$ There's also environmental factors.

NOTE Confidence: 0.80238247

 $00:41:49.690 \longrightarrow 00:41:51.070$ You guys all know.

 $00:41:51.070 \longrightarrow 00:41:52.800$ I'm sure about talc use.

NOTE Confidence: 0.80238247

 $00:41:52.800 \longrightarrow 00:41:55.208$ There's a lot of debate on that,

NOTE Confidence: 0.80238247

 $00:41:55.210 \longrightarrow 00:41:56.590$ but there's cigarette smoking

NOTE Confidence: 0.80238247

 $00:41:56.590 \longrightarrow 00:41:57.970$ as well as asbestos.

NOTE Confidence: 0.80238247

 $00:41:57.970 \longrightarrow 00:41:59.700$ That's considered risk as well.

NOTE Confidence: 0.7751556

 $00:42:02.000 \longrightarrow 00:42:04.051$ And the thinking for that we don't

NOTE Confidence: 0.7751556

 $00:42:04.051 \longrightarrow 00:42:06.237$ have time to talk about this now,

NOTE Confidence: 0.7751556

 $00:42:06.240 \longrightarrow 00:42:07.452$ but there's two different

NOTE Confidence: 0.7751556

00:42:07.452 --> 00:42:08.664 thoughts of ovarian cancer.

NOTE Confidence: 0.7751556

 $00:42:08.670 \longrightarrow 00:42:10.734$ One thought as I could want mentioned that

NOTE Confidence: 0.7751556

 $00:42:10.734 \longrightarrow 00:42:12.932$ some of these cancers actually arise in

NOTE Confidence: 0.7751556

 $00:42:12.932 \longrightarrow 00:42:15.030$ the fallopian tubes and ovarian cancers.

NOTE Confidence: 0.7751556

 $00:42:15.030 \longrightarrow 00:42:17.144$ Actually, not only in Kansas at all,

NOTE Confidence: 0.7751556

 $00:42:17.150 \longrightarrow 00:42:18.710$ their fallopian tube cancers that

NOTE Confidence: 0.7751556

 $00:42:18.710 \longrightarrow 00:42:20.801$ have spread to the ovaries and the

 $00:42:20.801 \longrightarrow 00:42:22.474$ other thing is that every time a

NOTE Confidence: 0.7751556

 $00{:}42{:}22.474 \dashrightarrow 00{:}42{:}24.175$ woman ovulates that there's some

NOTE Confidence: 0.7751556

 $00:42:24.175 \longrightarrow 00:42:25.935$ sort of tumorigenesis that happen.

NOTE Confidence: 0.7751556

 $00:42:25.940 \longrightarrow 00:42:28.356$ So the less time shabulat the lesser risk,

NOTE Confidence: 0.7751556

 $00:42:28.360 \longrightarrow 00:42:30.726$ the more times the Morris for risk.

NOTE Confidence: 0.7751556

00:42:30.730 --> 00:42:33.574 That's why having a lot of

NOTE Confidence: 0.7751556

 $00{:}42{:}33.574 \dashrightarrow 00{:}42{:}35.470$ children having five children.

NOTE Confidence: 0.7751556

00:42:35.470 --> 00:42:37.654 It reduces your risk of basket

NOTE Confidence: 0.7751556

 $00:42:37.654 \longrightarrow 00:42:39.470$ of ovarian cancer by 50%.

NOTE Confidence: 0.7751556

 $00:42:39.470 \longrightarrow 00:42:40.702$ I got very close.

NOTE Confidence: 0.7751556

 $00:42:40.702 \longrightarrow 00:42:43.464$ I got to four very close to that

NOTE Confidence: 0.7751556

 $00:42:43.464 \longrightarrow 00:42:45.972$ reduction breast feeding every child for

NOTE Confidence: 0.7751556

 $00:42:45.972 \longrightarrow 00:42:48.938$ one year also gives you 50% the other

NOTE Confidence: 0.7751556

 $00{:}42{:}48.938 \dashrightarrow 00{:}42{:}51.486$ the other way to decrease your risk,

NOTE Confidence: 0.7751556

 $00:42:51.490 \longrightarrow 00:42:53.674$ which is much more sane than

NOTE Confidence: 0.7751556

 $00:42:53.674 \longrightarrow 00:42:55.130$ having so many children.

 $00:42:55.130 \longrightarrow 00:42:56.502$ It's birth control pills.

NOTE Confidence: 0.7751556

00:42:56.502 --> 00:42:59.036 So any woman who uses birth control

NOTE Confidence: 0.7751556

 $00:42:59.036 \longrightarrow 00:43:01.448$ pills for five years during her

NOTE Confidence: 0.7751556

 $00:43:01.448 \longrightarrow 00:43:03.498$ lifetime decreases her risk by 50%.

NOTE Confidence: 0.7751556

00:43:03.500 --> 00:43:05.640 Anybody who uses birth control?

NOTE Confidence: 0.7751556

 $00:43:05.640 \longrightarrow 00:43:07.860$ Pills for 10 years decreases her

NOTE Confidence: 0.7751556

 $00:43:07.860 \longrightarrow 00:43:10.422$ risk by 80% and 15 years decrease

NOTE Confidence: 0.7751556

 $00:43:10.422 \longrightarrow 00:43:13.040$ for risk by 15 by 90%.

NOTE Confidence: 0.7751556

 $00:43:13.040 \longrightarrow 00:43:15.490$ So so huge differences and this is

NOTE Confidence: 0.7751556

 $00:43:15.490 \longrightarrow 00:43:17.849$ something that I always talk about.

NOTE Confidence: 0.7751556

00:43:17.850 --> 00:43:20.440 Doesn't matter what talk I ever give,

NOTE Confidence: 0.7751556

 $00:43:20.440 \longrightarrow 00:43:22.290$ I always talk about that.

NOTE Confidence: 0.7751556

 $00:43:22.290 \longrightarrow 00:43:23.086$ You know,

NOTE Confidence: 0.7751556

 $00:43:23.086 \longrightarrow 00:43:25.474$ taking birth control pills is really

NOTE Confidence: 0.7751556

 $00:43:25.474 \longrightarrow 00:43:28.313$ the biggest thing that we as women can

00:43:28.313 --> 00:43:30.800 do for risk reduction of this cancers.

NOTE Confidence: 0.8222318

 $00:43:33.840 \longrightarrow 00:43:35.272$ And then tubal ligations,

NOTE Confidence: 0.8222318

 $00:43:35.272 \longrightarrow 00:43:36.704$ like the one mentioned,

NOTE Confidence: 0.8222318

 $00:43:36.710 \longrightarrow 00:43:39.454$ because we think that some of these cancers

NOTE Confidence: 0.8222318

 $00:43:39.454 \longrightarrow 00:43:41.020$ actually originated fallopian tube,

NOTE Confidence: 0.8222318

 $00:43:41.020 \longrightarrow 00:43:43.354$ so removing the fallopian tube is

NOTE Confidence: 0.8222318

 $00:43:43.354 \longrightarrow 00:43:46.047$ actually a huge thing that we can do.

NOTE Confidence: 0.8222318

 $00:43:46.050 \longrightarrow 00:43:51.008$ It decreases your risk by 70% when you do it.

NOTE Confidence: 0.8222318

00:43:51.010 --> 00:43:53.790 So I'm going to bring us to the end just

NOTE Confidence: 0.8222318

 $00:43:53.869 \longrightarrow 00:43:56.305$ so that we have time for questions.

NOTE Confidence: 0.8222318

 $00{:}43{:}56.310 \dashrightarrow 00{:}43{:}58.680$ And you know, I just wanted to to make a

NOTE Confidence: 0.8222318

00:43:58.739 --> 00:44:00.989 few points about gynecological cancer.

NOTE Confidence: 0.8222318

 $00:44:00.990 \longrightarrow 00:44:05.310$ Before that the audio will take it over with.

NOTE Confidence: 0.8222318

 $00{:}44{:}05.310 \dashrightarrow 00{:}44{:}07.030$ Talking about radiation on cology so

NOTE Confidence: 0.8222318

 $00:44:07.030 \longrightarrow 00:44:09.458$ so much has changed in the field

NOTE Confidence: 0.8222318

 $00:44:09.458 \longrightarrow 00:44:11.068$ were going to logic ecology.

 $00:44:11.070 \longrightarrow 00:44:13.110$ So much research is being done.

NOTE Confidence: 0.8222318

 $00:44:13.110 \longrightarrow 00:44:15.945$ A lot of you on this call I actually

NOTE Confidence: 0.8222318

00:44:15.945 --> 00:44:18.402 touched first hand by this and know

NOTE Confidence: 0.8222318

 $00:44:18.402 \longrightarrow 00:44:20.569$ the advances that we have made.

NOTE Confidence: 0.8222318

 $00:44:20.570 \longrightarrow 00:44:22.936$ You know we no longer treat everybody

NOTE Confidence: 0.8222318

 $00:44:22.936 \longrightarrow 00:44:24.972$ the same, you know, not it.

NOTE Confidence: 0.8222318

00:44:24.972 --> 00:44:26.324 You know you know,

NOTE Confidence: 0.8222318

 $00{:}44{:}26.330 \to 00{:}44{:}28.612$ longer just come and get the same

NOTE Confidence: 0.8222318

00:44:28.612 --> 00:44:30.350 chemotherapy no matter what things

NOTE Confidence: 0.8222318

 $00:44:30.350 \longrightarrow 00:44:31.746$ are now truly different,

NOTE Confidence: 0.8222318

 $00:44:31.750 \longrightarrow 00:44:33.138$ truly personalized and individualized.

NOTE Confidence: 0.8222318

 $00:44:33.138 \longrightarrow 00:44:35.590$ And we understand what mutations the cancer.

NOTE Confidence: 0.8222318

 $00:44:35.590 \longrightarrow 00:44:38.094$ Has we studied this in in mice and

NOTE Confidence: 0.8222318

 $00:44:38.094 \longrightarrow 00:44:40.070$ we really understand what treatment

NOTE Confidence: 0.8222318

 $00:44:40.070 \longrightarrow 00:44:41.774$ is best for you?

 $00:44:41.780 \longrightarrow 00:44:44.684$ This is what allows women the best outcome.

NOTE Confidence: 0.8222318

00:44:44.690 --> 00:44:46.130 The longest survival cure,

NOTE Confidence: 0.8222318

00:44:46.130 --> 00:44:48.690 but also quality of life you know,

NOTE Confidence: 0.8222318

 $00:44:48.690 \longrightarrow 00:44:51.178$ allowed to live your life how you are

NOTE Confidence: 0.8222318

 $00:44:51.178 \longrightarrow 00:44:54.149$ and not allowing cancer to really change.

NOTE Confidence: 0.8222318

00:44:54.150 --> 00:44:56.894 Change your quality of life but so

NOTE Confidence: 0.8222318

 $00{:}44{:}56.894 \dashrightarrow 00{:}44{:}59.644$ much more should be done and so much

NOTE Confidence: 0.8222318

 $00:44:59.644 \longrightarrow 00:45:02.761$ more has to be done and so much that

NOTE Confidence: 0.8222318

 $00{:}45{:}02.761 \dashrightarrow 00{:}45{:}05.065$ should be done in early detection

NOTE Confidence: 0.8222318

 $00:45:05.070 \longrightarrow 00:45:05.774$ and prevention.

NOTE Confidence: 0.8222318

 $00{:}45{:}05.774 \longrightarrow 00{:}45{:}08.590$ But the biggest part of it is really

NOTE Confidence: 0.8222318

 $00:45:08.658 \longrightarrow 00:45:10.686$ more than anything else that we've

NOTE Confidence: 0.8222318

 $00{:}45{:}10.686 \longrightarrow 00{:}45{:}13.762$ done in the lab more than more than

NOTE Confidence: 0.8222318

00:45:13.762 --> 00:45:15.827 testing more than different tumor

NOTE Confidence: 0.8222318

 $00:45:15.827 \longrightarrow 00:45:18.370$ markers or biomarkers that we're looking at.

NOTE Confidence: 0.8222318

 $00:45:18.370 \longrightarrow 00:45:20.862$ The blood is really kind of awareness

 $00:45:20.862 \longrightarrow 00:45:21.930$ and an advocacy,

NOTE Confidence: 0.8222318

00:45:21.930 --> 00:45:24.066 and know your body and talking

NOTE Confidence: 0.8222318

 $00:45:24.066 \longrightarrow 00:45:25.134$ to your friends.

NOTE Confidence: 0.8222318

00:45:25.140 --> 00:45:26.163 And you know,

NOTE Confidence: 0.8222318

 $00:45:26.163 \longrightarrow 00:45:29.050$ we as women and men on this call,

NOTE Confidence: 0.8222318

 $00:45:29.050 \longrightarrow 00:45:31.192$ you guys had the biggest advocates

NOTE Confidence: 0.8222318

 $00:45:31.192 \longrightarrow 00:45:33.548$ you know when somebody I cannot tell

NOTE Confidence: 0.8222318

00:45:33.548 --> 00:45:35.564 you how many women I have talked

NOTE Confidence: 0.8222318

 $00:45:35.628 \longrightarrow 00:45:37.748$ to subsequently or diagnose after

NOTE Confidence: 0.8222318

 $00:45:37.748 \longrightarrow 00:45:39.444$ one of these conversations.

NOTE Confidence: 0.8222318

 $00:45:39.450 \longrightarrow 00:45:41.346$ Because when we stop to think

NOTE Confidence: 0.8222318

 $00:45:41.346 \longrightarrow 00:45:42.610$ and remember the date,

NOTE Confidence: 0.8222318

 $00:45:42.610 \longrightarrow 00:45:44.470$ these things kind of stick with

NOTE Confidence: 0.8222318

 $00:45:44.470 \longrightarrow 00:45:47.157$ us and kind of influence what we

NOTE Confidence: 0.8222318

00:45:47.157 --> 00:45:48.537 remember going forward.

 $00:45:48.540 \longrightarrow 00:45:51.006$ So thank you so much for the time and

NOTE Confidence: 0.8222318

 $00:45:51.006 \longrightarrow 00:45:53.774$ we're so thrilled that you're with us today.

NOTE Confidence: 0.8222318

 $00{:}45{:}53.780 \dashrightarrow 00{:}45{:}55.996$ I'll let Doctor Ariel do her part and

NOTE Confidence: 0.8222318

 $00:45:55.996 \longrightarrow 00:45:58.399$ then we will have time for questions.

NOTE Confidence: 0.92061305

 $00:46:13.040 \longrightarrow 00:46:16.110$ Thank you. Um, let's see.

NOTE Confidence: 0.88974226

 $00:46:19.060 \longrightarrow 00:46:23.253$ So I put together a few slides

NOTE Confidence: 0.88974226

 $00:46:23.253 \longrightarrow 00:46:25.050$ about radiotherapy applications

NOTE Confidence: 0.88974226

 $00:46:25.155 \longrightarrow 00:46:27.669$ for gynecological cancers.

NOTE Confidence: 0.88974226

 $00{:}46{:}27.670 \dashrightarrow 00{:}46{:}31.883$ And for the people in audience who are

NOTE Confidence: 0.88974226

00:46:31.883 --> 00:46:35.788 not quite familiar with radiation therapy,

NOTE Confidence: 0.88974226

 $00:46:35.790 \longrightarrow 00:46:37.407$ what is radiation?

NOTE Confidence: 0.88974226

 $00:46:37.407 \longrightarrow 00:46:40.641$ It's a treatment modality that uses

NOTE Confidence: 0.88974226

 $00:46:40.641 \longrightarrow 00:46:44.557$ high energy particles and hard energy

NOTE Confidence: 0.88974226

 $00{:}46{:}44.557 {\:\dashrightarrow\:} 00{:}46{:}47.842$ electromagnetic waves to destroy cancer

NOTE Confidence: 0.88974226

 $00:46:47.942 \longrightarrow 00:46:50.975$ cells and the target for radiation

NOTE Confidence: 0.88974226

 $00:46:50.975 \longrightarrow 00:46:54.400$ treatment for radiation waves is

 $00:46:54.400 \longrightarrow 00:46:58.438$ basically the DNA molecule of the cell.

NOTE Confidence: 0.88974226

 $00{:}46{:}58.440 \dashrightarrow 00{:}47{:}01.590$ The radiation damages the DNA,

NOTE Confidence: 0.88974226

 $00:47:01.590 \longrightarrow 00:47:04.740$ breaks the DNA and produces.

NOTE Confidence: 0.88974226

 $00:47:04.740 \longrightarrow 00:47:09.270$ In the end cancer cell death.

NOTE Confidence: 0.88974226

 $00:47:09.270 \longrightarrow 00:47:11.638$ Um? According to sorry.

NOTE Confidence: 0.88974226

 $00{:}47{:}11.638 \dashrightarrow 00{:}47{:}14.598$ So basically radiation happy help

NOTE Confidence: 0.88974226

 $00:47:14.598 \longrightarrow 00:47:17.788$ clinically has been a therapeutic

NOTE Confidence: 0.88974226

 $00{:}47{:}17.788 {\:\raisebox{--}{\text{--}}}{\:\raisebox{--}{\text{--}}}{\:\raisebox{--}{\text{--}}} 00{:}47{:}19.669$ component for gynecological

NOTE Confidence: 0.88974226

00:47:19.669 --> 00:47:22.822 malignancies for many many years

NOTE Confidence: 0.88974226

 $00:47:22.822 \longrightarrow 00:47:25.782$ according to evidence based treatment

NOTE Confidence: 0.88974226

 $00{:}47{:}25.782 \dashrightarrow 00{:}47{:}28.139$ guidelines has been published.

NOTE Confidence: 0.88974226

 $00:47:28.139 \longrightarrow 00:47:31.613$ An article they looked into estimated

NOTE Confidence: 0.88974226

 $00:47:31.613 \longrightarrow 00:47:35.180$ frequency of use of radiation for

NOTE Confidence: 0.88974226

 $00:47:35.180 \longrightarrow 00:47:37.496$ gynecological malignancies and can

NOTE Confidence: 0.88974226

 $00:47:37.496 \longrightarrow 00:47:40.928$ see that most commonly we apply.

 $00:47:40.930 \longrightarrow 00:47:44.969$ Radiation for cervical cancer is up to

NOTE Confidence: 0.88974226

 $00{:}47{:}44.969 \dashrightarrow 00{:}47{:}48.440$ 60% of patients then endometrial cancer.

NOTE Confidence: 0.88974226

 $00:47:48.440 \longrightarrow 00:47:51.330$ 45% volver cased cancer 40%.

NOTE Confidence: 0.88974226

00:47:51.330 --> 00:47:54.798 Actually vaginal cancer is very rare,

NOTE Confidence: 0.88974226

 $00:47:54.800 \longrightarrow 00:47:58.352$ but it's almost 100% of the

NOTE Confidence: 0.88974226

 $00:47:58.352 \longrightarrow 00:48:01.160$ cases require radiation and 10%

NOTE Confidence: 0.88974226

 $00:48:01.160 \longrightarrow 00:48:04.050$ of patients with ovarian cancer.

NOTE Confidence: 0.88974226

 $00:48:04.050 \longrightarrow 00:48:07.170$ So the least.

NOTE Confidence: 0.88974226

 $00{:}48{:}07.170 --> 00{:}48{:}09.598$ So there are two approaches.

NOTE Confidence: 0.88974226

 $00{:}48{:}09.598 \dashrightarrow 00{:}48{:}11.534$ When we administer radiation

NOTE Confidence: 0.88974226

00:48:11.534 --> 00:48:12.986 for gynecological cancers,

NOTE Confidence: 0.88974226

00:48:12.990 --> 00:48:16.105 one is external radiation and the 2nd

NOTE Confidence: 0.88974226

 $00:48:16.105 \longrightarrow 00:48:18.809$ is internal radiation or brachytherapy.

NOTE Confidence: 0.88974226

00:48:18.810 --> 00:48:19.792 So this,

NOTE Confidence: 0.88974226

 $00:48:19.792 \longrightarrow 00:48:22.247$ this slide illustrates the external

NOTE Confidence: 0.88974226

 $00{:}48{:}22.247 \dashrightarrow 00{:}48{:}24.150$ radiation is administered with.

 $00:48:24.150 \longrightarrow 00:48:26.570$ With this big machine called

NOTE Confidence: 0.88974226

 $00:48:26.570 \longrightarrow 00:48:27.538$ linear accelerator,

NOTE Confidence: 0.88974226

 $00:48:27.540 \longrightarrow 00:48:30.762$ the patient is positioned on the

NOTE Confidence: 0.88974226

 $00:48:30.762 \longrightarrow 00:48:32.910$ treatment table and radiation

NOTE Confidence: 0.88974226

00:48:33.000 --> 00:48:35.700 treatment is given from is produced

NOTE Confidence: 0.88974226

 $00:48:35.700 \longrightarrow 00:48:39.237$ here in the head of the machine and.

NOTE Confidence: 0.88974226

 $00:48:39.240 \longrightarrow 00:48:43.850$ He's aimed to the area that we want to treat.

NOTE Confidence: 0.88974226 00:48:43.850 --> 00:48:44.294 Um,

NOTE Confidence: 0.88974226

 $00:48:44.294 \longrightarrow 00:48:47.402$ for gynecological cancers we use a lot

NOTE Confidence: 0.88974226

 $00:48:47.402 \longrightarrow 00:48:50.049$ bracket the rapy or internal radiation.

NOTE Confidence: 0.88974226

 $00{:}48{:}50.050 \dashrightarrow 00{:}48{:}53.452$ What does it mean that applicators are

NOTE Confidence: 0.88974226

 $00:48:53.452 \longrightarrow 00:48:56.728$ placed inside the body of the patient

NOTE Confidence: 0.88974226

 $00{:}48{:}56.728 \dashrightarrow 00{:}49{:}00.550$ and then they are connected to this machine,

NOTE Confidence: 0.88974226

00:49:00.550 --> 00:49:03.406 that is housing the radiation source

NOTE Confidence: 0.88974226

 $00:49:03.406 \longrightarrow 00:49:06.325$ most frequently is iradium 192 is

00:49:06.325 --> 00:49:08.650 high dose rate brachytherapy device,

NOTE Confidence: 0.88974226

 $00:49:08.650 \longrightarrow 00:49:11.499$ so when we turn on this machine

NOTE Confidence: 0.88974226

 $00:49:11.499 \longrightarrow 00:49:14.440$ the source of radiation travels.

NOTE Confidence: 0.88974226

00:49:14.440 --> 00:49:17.218 Through this connection to the patient's

NOTE Confidence: 0.88974226

00:49:17.218 --> 00:49:20.049 body to the applicator delivers the

NOTE Confidence: 0.88974226

00:49:20.049 --> 00:49:23.192 radiation and after the dose is delivered,

NOTE Confidence: 0.88974226

 $00:49:23.200 \longrightarrow 00:49:26.968$ it returns back to the housing.

NOTE Confidence: 0.88974226

 $00{:}49{:}26.970 \dashrightarrow 00{:}49{:}29.330$ Machine those are some examples

NOTE Confidence: 0.88974226

 $00{:}49{:}29.330 \dashrightarrow 00{:}49{:}32.409$ of applicators that we use for

NOTE Confidence: 0.88974226

00:49:32.409 --> 00:49:34.949 brachytherapy for inside radiation,

NOTE Confidence: 0.88974226

 $00{:}49{:}34.950 \dashrightarrow 00{:}49{:}38.492$ so they are actually placed in close

NOTE Confidence: 0.88974226

 $00:49:38.492 \longrightarrow 00:49:41.680$ proximity to the tumor or targeted

NOTE Confidence: 0.88974226

 $00:49:41.680 \longrightarrow 00:49:46.120$ area and sometimes right in the tumor itself.

NOTE Confidence: 0.88974226

 $00{:}49{:}46.120 \dashrightarrow 00{:}49{:}47.716$ So for example,

NOTE Confidence: 0.88974226

 $00:49:47.716 \longrightarrow 00:49:49.844$ those are vaginal cylinders.

NOTE Confidence: 0.88974226

 $00:49:49.850 \longrightarrow 00:49:53.707$ Those are thin hollow tubes that are

 $00:49:53.707 \longrightarrow 00:49:57.228$ actually introduced in the uterine cavity.

NOTE Confidence: 0.88974226

 $00{:}49{:}57.230 \dashrightarrow 00{:}50{:}00.386$ And placed in proximity to the.

NOTE Confidence: 0.88974226

 $00{:}50{:}00.390 \dashrightarrow 00{:}50{:}02.580$ Cervix for basically for cervical

NOTE Confidence: 0.88974226

 $00:50:02.580 \longrightarrow 00:50:05.331$ cancer and those are needles that

NOTE Confidence: 0.88974226

 $00:50:05.331 \longrightarrow 00:50:07.746$ actually are used for brachytherapy.

NOTE Confidence: 0.88974226

 $00{:}50{:}07.750 \dashrightarrow 00{:}50{:}11.110$ When we want to treat gross tumor so

NOTE Confidence: 0.88974226

 $00:50:11.110 \longrightarrow 00:50:14.650$ they are placed inside the tumor itself.

NOTE Confidence: 0.88974226

 $00:50:14.650 \longrightarrow 00:50:17.770$ So there are basically three main

NOTE Confidence: 0.88974226

 $00:50:17.770 \longrightarrow 00:50:19.898$ clinical indications for radiation.

NOTE Confidence: 0.88974226

00:50:19.900 --> 00:50:20.872 In practice,

NOTE Confidence: 0.88974226

 $00:50:20.872 \longrightarrow 00:50:23.788$ one is related to the surgery

NOTE Confidence: 0.88974226

 $00:50:23.788 \longrightarrow 00:50:25.830$ that removes the cancer.

NOTE Confidence: 0.88974226

 $00{:}50{:}25.830 \dashrightarrow 00{:}50{:}29.430$ So we know surgery we want to the

NOTE Confidence: 0.88974226

 $00:50:29.430 \longrightarrow 00:50:32.737$ cancer to be removed by surgery.

NOTE Confidence: 0.88974226

 $00:50:32.740 \longrightarrow 00:50:34.816$ But sometimes radiation helps

00:50:34.816 --> 00:50:37.411 before surgery to shrink the

NOTE Confidence: 0.88974226

00:50:37.411 --> 00:50:39.660 tumor and make the surgery.

NOTE Confidence: 0.88974226

00:50:39.660 --> 00:50:42.618 Maybe a little bit less extensive.

NOTE Confidence: 0.88974226

 $00:50:42.620 \longrightarrow 00:50:45.105$ And sometimes we give radiation

NOTE Confidence: 0.88974226

 $00:50:45.105 \longrightarrow 00:50:47.590$ based on the stage and

NOTE Confidence: 0.879658

00:50:47.692 --> 00:50:50.547 risk factors after the surgery.

NOTE Confidence: 0.879658

 $00:50:50.550 \longrightarrow 00:50:51.873$ In this situation,

NOTE Confidence: 0.879658

00:50:51.873 --> 00:50:54.960 is given to prevent tomorrow or to

NOTE Confidence: 0.879658

 $00:50:55.046 \longrightarrow 00:50:58.208$ decrease the risk of tumor recurrence.

NOTE Confidence: 0.879658

 $00:50:58.210 \longrightarrow 00:51:03.160$ So we these. In this third radiation,

NOTE Confidence: 0.879658

 $00{:}51{:}03.160 \dashrightarrow 00{:}51{:}05.200$ when radiation is given related to

NOTE Confidence: 0.879658

 $00:51:05.266 \longrightarrow 00:51:07.286$ surgery can be administered either

NOTE Confidence: 0.879658

00:51:07.286 --> 00:51:09.240 external or internal, and usually

NOTE Confidence: 0.879658

 $00:51:09.240 \longrightarrow 00:51:12.840$ the duration is 3 to 5 weeks course.

NOTE Confidence: 0.879658

 $00:51:12.840 \longrightarrow 00:51:15.730$ Another application is definitive treatment

NOTE Confidence: 0.879658

 $00:51:15.730 \longrightarrow 00:51:19.580$ when tumors cannot be removed by surgery,

 $00:51:19.580 \longrightarrow 00:51:22.390$ so we rely on radiation

NOTE Confidence: 0.879658

 $00:51:22.390 \longrightarrow 00:51:24.638$ to control those tumors.

NOTE Confidence: 0.879658

 $00:51:24.640 \longrightarrow 00:51:27.450$ Usually chemotherapy is given together

NOTE Confidence: 0.879658

 $00:51:27.450 \longrightarrow 00:51:30.260$ most frequently in the cervical,

NOTE Confidence: 0.879658

00:51:30.260 --> 00:51:32.508 vulvar, and vaginal cancer,

NOTE Confidence: 0.879658

00:51:32.508 --> 00:51:35.880 and again when we treat definitively,

NOTE Confidence: 0.879658

00:51:35.880 --> 00:51:38.690 it's sometimes it's a combination

NOTE Confidence: 0.879658

 $00{:}51{:}38.690 \dashrightarrow 00{:}51{:}41.500$ of external and internal radiation,

NOTE Confidence: 0.879658

 $00:51:41.500 \longrightarrow 00:51:43.105$ and sometimes it's.

NOTE Confidence: 0.879658

 $00:51:43.105 \longrightarrow 00:51:44.710$ Only external radiation,

NOTE Confidence: 0.879658

 $00:51:44.710 \longrightarrow 00:51:47.428$ but the course is long because

NOTE Confidence: 0.879658

 $00:51:47.428 \longrightarrow 00:51:50.520$ we need to give higher dose.

NOTE Confidence: 0.879658

 $00:51:50.520 \longrightarrow 00:51:53.908$ So 67 even more weeks of treatment.

NOTE Confidence: 0.879658

 $00:51:53.910 \longrightarrow 00:51:56.330$ And of course for palliation,

NOTE Confidence: 0.879658

00:51:56.330 --> 00:51:58.166 when kind of Khalaj,

 $00:51:58.166 \longrightarrow 00:52:00.002$ ikle tumors themselves or

NOTE Confidence: 0.879658

 $00{:}52{:}00.002 --> 00{:}52{:}01.650 \ \mathrm{metastasis} \ \mathrm{cause} \ \mathrm{symptoms},$

NOTE Confidence: 0.879658

00:52:01.650 --> 00:52:05.038 then we give short course of radiation,

NOTE Confidence: 0.879658

00:52:05.040 --> 00:52:06.444 external radiation treatment

NOTE Confidence: 0.879658

 $00:52:06.444 \longrightarrow 00:52:09.720$ one to two weeks and example of

NOTE Confidence: 0.879658

00:52:09.802 --> 00:52:12.297 symptoms are like bleeding pain,

NOTE Confidence: 0.879658

 $00:52:12.300 \longrightarrow 00:52:13.444$ pressure, obstruction.

NOTE Confidence: 0.879658

 $00:52:13.444 \longrightarrow 00:52:15.732$ That reduction has been

NOTE Confidence: 0.879658

00:52:15.732 --> 00:52:17.448 proven quite successful.

NOTE Confidence: 0.879658

 $00:52:17.450 \longrightarrow 00:52:20.660$ Successful in palliate.

NOTE Confidence: 0.879658

00:52:20.660 --> 00:52:24.470 So it always has been a concern for

NOTE Confidence: 0.879658

00:52:24.470 --> 00:52:26.378 treatment related side effects,

NOTE Confidence: 0.879658

 $00{:}52{:}26.380 \dashrightarrow 00{:}52{:}28.772$ radiation related side effects.

NOTE Confidence: 0.879658

 $00:52:28.772 \longrightarrow 00:52:31.164$ So basically technical advancements

NOTE Confidence: 0.879658

 $00:52:31.164 \longrightarrow 00:52:34.271$ that have been achieved in the last

NOTE Confidence: 0.879658

 $00:52:34.271 \longrightarrow 00:52:37.532$ years allow us to get a better cancer

 $00:52:37.532 \longrightarrow 00:52:39.787$ control and decreased side effects

NOTE Confidence: 0.879658

 $00:52:39.787 \longrightarrow 00:52:42.103$ and for gynecological cancers we

NOTE Confidence: 0.879658

00:52:42.103 --> 00:52:44.929 are looking at side effects related

NOTE Confidence: 0.879658

00:52:44.929 --> 00:52:47.467 to rectum urinary bladder bowel

NOTE Confidence: 0.879658

 $00{:}52{:}47.467 \dashrightarrow 00{:}52{:}49.957$ because those are organs close.

NOTE Confidence: 0.879658

 $00:52:49.960 \longrightarrow 00:52:53.446$ In the area where we administer

NOTE Confidence: 0.879658

 $00:52:53.446 \longrightarrow 00:52:55.770$ radiation for these diagnosis,

NOTE Confidence: 0.879658

 $00.52.55.770 \longrightarrow 00.52.57.627$ so for example,

NOTE Confidence: 0.879658

 $00:52:57.627 \longrightarrow 00:53:00.415$ technical advancements are software

NOTE Confidence: 0.879658

 $00:53:00.415 \longrightarrow 00:53:03.900$ algorithms that have been created

NOTE Confidence: 0.879658

 $00{:}53{:}03.991 \dashrightarrow 00{:}53{:}06.721$ and allow us to incorporate the

NOTE Confidence: 0.879658

 $00:53:06.721 \longrightarrow 00:53:08.541$ PET CT scan images,

NOTE Confidence: 0.879658

 $00{:}53{:}08.550 \dashrightarrow 00{:}53{:}13.398$ MRI images in our treatment planning.

NOTE Confidence: 0.879658

 $00:53:13.400 \longrightarrow 00:53:15.965$ Another advance that now it's

NOTE Confidence: 0.879658

 $00:53:15.965 \longrightarrow 00:53:19.717$ advancement that is now part of our

 $00:53:19.717 \longrightarrow 00:53:23.005$ daily treatments is and standard is

NOTE Confidence: 0.879658

 $00:53:23.005 \longrightarrow 00:53:25.789$ intensity modulated radiation therapy.

NOTE Confidence: 0.879658

00:53:25.790 --> 00:53:28.616 This is a way to administer

NOTE Confidence: 0.879658

00:53:28.616 --> 00:53:31.810 radiation in a very conform way,

NOTE Confidence: 0.879658

 $00:53:31.810 \longrightarrow 00:53:35.324$ conform to the shape of the tumor.

NOTE Confidence: 0.879658

 $00:53:35.330 \longrightarrow 00:53:39.074$ So in this way we could increase the

NOTE Confidence: 0.879658

 $00:53:39.074 \longrightarrow 00:53:42.858$ dose that we administer to the tumor,

NOTE Confidence: 0.879658

 $00:53:42.860 \longrightarrow 00:53:45.370$ sparing healthy tissues around it.

NOTE Confidence: 0.879658

 $00{:}53{:}45.370 \dashrightarrow 00{:}53{:}47.575$ Another good advancement that we

NOTE Confidence: 0.879658

 $00:53:47.575 \longrightarrow 00:53:50.916$ also apply on a daily basis is

NOTE Confidence: 0.879658

 $00{:}53{:}50.916 \dashrightarrow 00{:}53{:}53.531$ incorporation of high quality images

NOTE Confidence: 0.879658

 $00:53:53.531 \longrightarrow 00:53:57.069$ taking just before each treatment session.

NOTE Confidence: 0.879658

 $00:53:57.070 \longrightarrow 00:53:59.872$ To make sure that patient is

NOTE Confidence: 0.879658

 $00:53:59.872 \longrightarrow 00:54:01.740$ positioned correctly and radiation

NOTE Confidence: 0.879658

 $00:54:01.815 \longrightarrow 00:54:04.410$ is administered with high accuracy.

NOTE Confidence: 0.879658

00:54:04.410 --> 00:54:06.984 So this is image guided radiation

 $00:54:06.984 \longrightarrow 00:54:09.780$ therapy and our linear accelerators.

NOTE Confidence: 0.879658

00:54:09.780 --> 00:54:11.277 So our machine,

NOTE Confidence: 0.879658

 $00:54:11.277 \longrightarrow 00:54:13.273$ external radiation machines are

NOTE Confidence: 0.879658

00:54:13.273 --> 00:54:16.249 very capable and we can obtain

NOTE Confidence: 0.879658

 $00:54:16.249 \longrightarrow 00:54:18.584$ this images before each treatment.

NOTE Confidence: 0.86734736

 $00:54:20.820 \longrightarrow 00:54:24.628$ The least promising research

NOTE Confidence: 0.86734736

 $00:54:24.628 \longrightarrow 00:54:29.388$ that probably will increase the.

NOTE Confidence: 0.86734736

 $00{:}54{:}29.390 \dashrightarrow 00{:}54{:}31.920$ Good results and for example,

NOTE Confidence: 0.86734736

 $00:54:31.920 \longrightarrow 00:54:34.200$ new combinations of radiation

NOTE Confidence: 0.86734736

 $00:54:34.200 \longrightarrow 00:54:36.480$ therapy with systemic treatments

NOTE Confidence: 0.86734736

 $00{:}54{:}36.480 \dashrightarrow 00{:}54{:}38.526$ like immunotherapy or inhibitors

NOTE Confidence: 0.86734736

 $00{:}54{:}38.526 \dashrightarrow 00{:}54{:}41.016$ of DNA repair mechanisms in cancer

NOTE Confidence: 0.86734736

 $00{:}54{:}41.016 \dashrightarrow 00{:}54{:}43.049$ cells like PARP inhibitors,

NOTE Confidence: 0.86734736

 $00:54:43.050 \longrightarrow 00:54:47.120$ and even for the radiation.

NOTE Confidence: 0.86734736

00:54:47.120 --> 00:54:49.766 Modalities there is a new radiation

 $00:54:49.766 \longrightarrow 00:54:52.529$ treatment devices that are being tested.

NOTE Confidence: 0.86734736

 $00{:}54{:}52.530 \dashrightarrow 00{:}54{:}55.068$ For example, this is a miniature

NOTE Confidence: 0.86734736

 $00{:}54{:}55.068 \dashrightarrow 00{:}54{:}57.800$ X Ray source exhaust system or

NOTE Confidence: 0.86734736

 $00:54:57.800 \longrightarrow 00:55:00.195$ that gives a precise concentrated

NOTE Confidence: 0.86734736

00:55:00.195 --> 00:55:02.909 dose directly to the tumor size,

NOTE Confidence: 0.86734736

 $00:55:02.910 \longrightarrow 00:55:06.393$ so site so this can be applied to breast

NOTE Confidence: 0.86734736

 $00:55:06.393 \longrightarrow 00:55:09.667$ cancer but also to gynecological cancers.

NOTE Confidence: 0.86734736

00:55:09.670 --> 00:55:12.814 So it's always knew research and

NOTE Confidence: 0.86734736

 $00{:}55{:}12.814 \dashrightarrow 00{:}55{:}16.150$ new results that we're looking for.

NOTE Confidence: 0.86734736

 $00:55:16.150 \longrightarrow 00:55:16.760$ Thank you.

NOTE Confidence: 0.87830025

 $00:55:18.920 \longrightarrow 00:55:19.510$ I think.

NOTE Confidence: 0.9130134

 $00:55:21.980 \longrightarrow 00:55:25.560$ Wonderful thank you so much.

NOTE Confidence: 0.9130134

 $00:55:25.560 \longrightarrow 00:55:27.300$ So we would love to open

NOTE Confidence: 0.9130134

 $00:55:27.300 \longrightarrow 00:55:29.058$ it to questions if if you

NOTE Confidence: 0.9130134

 $00:55:29.058 \longrightarrow 00:55:30.892$ guys have any you can do it.

NOTE Confidence: 0.9130134

00:55:30.900 --> 00:55:32.305 Probably live if you want

 $00:55:32.305 \longrightarrow 00:55:33.710$ to raise hands on Q&A,

NOTE Confidence: 0.9130134

 $00{:}55{:}33.710 \dashrightarrow 00{:}55{:}35.402$ we happy to talk about anything

NOTE Confidence: 0.9130134

 $00:55:35.402 \longrightarrow 00:55:37.360$ you guys would like to talk about.

NOTE Confidence: 0.9130134

 $00:55:37.360 \longrightarrow 00:55:38.488$ We're here to disposal.

NOTE Confidence: 0.87701935

 $00:55:43.040 \longrightarrow 00:55:45.992$ And if not, then we finished

NOTE Confidence: 0.87701935

00:55:45.992 --> 00:55:48.130 three minutes earlier. Thank you,

NOTE Confidence: 0.87701935

00:55:48.130 --> 00:55:50.116 thank you so much everybody will

NOTE Confidence: 0.87701935

00:55:50.116 --> 00:55:52.439 love being with you. I think your

NOTE Confidence: 0.8024052

 $00:55:52.440 \longrightarrow 00:55:54.420$ couple questions on the chat actually.

NOTE Confidence: 0.8630768

00:55:56.600 --> 00:55:58.568 One is for you, I think.

NOTE Confidence: 0.8341016

 $00:56:02.080 \longrightarrow 00:56:04.215$ So the first question that's right now,

NOTE Confidence: 0.8341016

00:56:04.220 --> 00:56:06.050 can you just repeat what they're

NOTE Confidence: 0.8341016

00:56:06.050 --> 00:56:07.270 using birth control pills?

NOTE Confidence: 0.8341016

 $00:56:07.270 \longrightarrow 00:56:09.538$ Reduce the chance of a very unimpressed

NOTE Confidence: 0.8341016

00:56:09.538 --> 00:56:11.540 had breast cancer and it's cut off.

 $00:56:11.540 \longrightarrow 00:56:14.276$ Let's see if there's a way I can get.

NOTE Confidence: 0.8341016

 $00:56:14.280 \longrightarrow 00:56:16.720$ So today I'll talk a little bit it,

NOTE Confidence: 0.8341016

 $00:56:16.720 \longrightarrow 00:56:19.338$ cut off a look at the end

NOTE Confidence: 0.8341016

 $00:56:19.338 \longrightarrow 00:56:21.838$ if you would like to just.

NOTE Confidence: 0.8341016

 $00:56:21.840 \longrightarrow 00:56:23.828$ If you like to type more so.

NOTE Confidence: 0.85754645

00:56:27.430 --> 00:56:29.170 Birth control pills unquestionably

NOTE Confidence: 0.85754645

 $00:56:29.170 \longrightarrow 00:56:31.345$ reduce the risk within cancer,

NOTE Confidence: 0.85754645

 $00:56:31.350 \longrightarrow 00:56:34.511$ and as I mentioned in the numbers,

NOTE Confidence: 0.85754645

 $00{:}56{:}34.511 \dashrightarrow 00{:}56{:}38.919$ very much very much so very significantly so.

NOTE Confidence: 0.85754645

00:56:38.920 --> 00:56:40.610 If you had breast cancer,

NOTE Confidence: 0.85754645

 $00:56:40.610 \longrightarrow 00:56:42.640$ is really the only time where

NOTE Confidence: 0.85754645

00:56:42.640 --> 00:56:44.668 you gotta talk to your provider

NOTE Confidence: 0.85754645

00:56:44.668 --> 00:56:46.405 to talk about pluses, minuses,

NOTE Confidence: 0.85754645

00:56:46.405 --> 00:56:49.100 because a lot of breast cancers are

NOTE Confidence: 0.85754645

 $00:56:49.100 \longrightarrow 00:56:50.907$ hormone sensitive and we would not

NOTE Confidence: 0.85754645

 $00:56:50.907 \longrightarrow 00:56:53.173$ want to do that if you had breast

 $00:56:53.173 \longrightarrow 00:56:55.411$ cancer because even though it would

NOTE Confidence: 0.85754645

 $00{:}56{:}55.411 \dashrightarrow 00{:}56{:}57.138$ decrease your risk within cancer,

NOTE Confidence: 0.85754645

00:56:57.138 --> 00:56:58.442 it would potentially increase

NOTE Confidence: 0.85754645

 $00:56:58.442 \longrightarrow 00:57:00.210$ your risk of breast cancer.

NOTE Confidence: 0.85754645

 $00:57:00.210 \longrightarrow 00:57:02.386$ So if if you don't have if you

NOTE Confidence: 0.85754645

 $00:57:02.386 \longrightarrow 00:57:04.468$ never had breast cancer then we

NOTE Confidence: 0.85754645

 $00:57:04.468 \longrightarrow 00:57:06.670$ very much feel that the benefits

NOTE Confidence: 0.85754645

 $00{:}57{:}06.743 \dashrightarrow 00{:}57{:}09.263$ that you get from the reduction in

NOTE Confidence: 0.85754645

 $00:57:09.263 \longrightarrow 00:57:12.070$ ovarian cancer and uterine cancer.

NOTE Confidence: 0.85754645

 $00:57:12.070 \longrightarrow 00:57:13.981$ Outweigh all the risks and and very

NOTE Confidence: 0.85754645

 $00:57:13.981 \longrightarrow 00:57:15.740$ much feel that it's worthwhile.

NOTE Confidence: 0.85754645

 $00:57:15.740 \longrightarrow 00:57:17.576$ But if you had breast cancer,

NOTE Confidence: 0.85754645

 $00:57:17.580 \dashrightarrow 00:57:20.325$ that would be the only time where you would.

NOTE Confidence: 0.85754645

 $00{:}57{:}20.330 \dashrightarrow 00{:}57{:}22.220$ You would be careful and you would

NOTE Confidence: 0.85754645

 $00:57:22.220 \longrightarrow 00:57:24.142$ need to speak with you with your

 $00:57:24.142 \longrightarrow 00:57:26.224$ doctor to make sure that the breast

NOTE Confidence: 0.85754645

 $00:57:26.224 \longrightarrow 00:57:27.976$ cancer wasn't hormone sensitive.

NOTE Confidence: 0.8763222

 $00{:}57{:}30.060 \dashrightarrow 00{:}57{:}32.398$ The second question is what are the

NOTE Confidence: 0.8763222

 $00:57:32.398 \longrightarrow 00:57:34.435$ latest findings for treatment for

NOTE Confidence: 0.8763222

00:57:34.435 --> 00:57:36.379 varying cancer with immunotherapy,

NOTE Confidence: 0.8763222

 $00:57:36.380 \longrightarrow 00:57:37.960$ which one specifically so

NOTE Confidence: 0.8763222

 $00:57:37.960 \longrightarrow 00:57:39.935$ I can start them glory.

NOTE Confidence: 0.8763222

 $00:57:39.940 \longrightarrow 00:57:41.910$ I'm sure you will like

NOTE Confidence: 0.8763222

 $00:57:41.910 \longrightarrow 00:57:43.486$ to get so immunotherapy.

NOTE Confidence: 0.8763222

 $00:57:43.490 \longrightarrow 00:57:45.440$ Is this wonderful new treatment

NOTE Confidence: 0.8763222

 $00{:}57{:}45.440 \dashrightarrow 00{:}57{:}47.840$ modality that we have started using.

NOTE Confidence: 0.8763222

 $00:57:47.840 \longrightarrow 00:57:48.234$ Unfortunately,

NOTE Confidence: 0.8763222

00:57:48.234 --> 00:57:51.386 it does not seem to be for everybody,

NOTE Confidence: 0.8763222

 $00:57:51.390 \longrightarrow 00:57:52.970$ and that's especially the

NOTE Confidence: 0.8763222

 $00:57:52.970 \longrightarrow 00:57:54.550$ case in ovarian cancer.

NOTE Confidence: 0.8763222

00:57:54.550 --> 00:57:56.920 You know, being cancer by itself,

 $00:57:56.920 \longrightarrow 00:57:59.685$ only 7% of women respond to immunotherapy,

NOTE Confidence: 0.8763222

 $00:57:59.690 \longrightarrow 00:58:02.210$ so not a great number.

NOTE Confidence: 0.8763222

 $00:58:02.210 \longrightarrow 00:58:05.297$ But it is just like everything that

NOTE Confidence: 0.8763222

 $00:58:05.297 \longrightarrow 00:58:08.367$ we talked in in the talk today.

NOTE Confidence: 0.8763222

 $00:58:08.370 \longrightarrow 00:58:11.010$ It is truly personalized and individualized.

NOTE Confidence: 0.8763222

 $00:58:11.010 \longrightarrow 00:58:14.027$ So when the when the cancer cells

NOTE Confidence: 0.8763222

00:58:14.027 --> 00:58:16.290 studied specifically for the patient,

NOTE Confidence: 0.8763222

00:58:16.290 --> 00:58:18.786 some of these cancer cells have

NOTE Confidence: 0.8763222

 $00:58:18.786 \longrightarrow 00:58:20.996$ specific mutations and for some

NOTE Confidence: 0.8763222

 $00:58:20.996 \longrightarrow 00:58:22.888$ of these specific mutations,

NOTE Confidence: 0.8763222

 $00{:}58{:}22.890 \dashrightarrow 00{:}58{:}24.742$ immunotherapy is very effective.

NOTE Confidence: 0.8763222

 $00:58:24.742 \longrightarrow 00:58:28.610$ So KEYTRUDA is the one that we would use.

NOTE Confidence: 0.8763222

 $00{:}58{:}28.610 \dashrightarrow 00{:}58{:}31.250$ But again, it's not for every body,

NOTE Confidence: 0.8763222

 $00:58:31.250 \longrightarrow 00:58:33.458$ it's specifically for those

NOTE Confidence: 0.8763222

 $00:58:33.458 \longrightarrow 00:58:35.114$ who have mutations.

00:58:35.120 --> 00:58:37.150 And there's a question about poverty matters,

NOTE Confidence: 0.8763222

00:58:37.150 --> 00:58:40.158 and that's very similar.

NOTE Confidence: 0.8763222

00:58:40.160 --> 00:58:42.320 Um, that's for proper hitters.

NOTE Confidence: 0.8763222

 $00:58:42.320 \longrightarrow 00:58:44.470$ There's nowadays a lot of

NOTE Confidence: 0.8763222

 $00:58:44.470 \longrightarrow 00:58:46.190$ literature and pop inhibitors.

NOTE Confidence: 0.8763222

 $00:58:46.190 \longrightarrow 00:58:49.060$ In 2014 was the first time where

NOTE Confidence: 0.8763222

 $00:58:49.060 \longrightarrow 00:58:51.709$ Papa inhibitors became part of the

NOTE Confidence: 0.8763222

00:58:51.709 --> 00:58:53.944 treatment regimen for Varian Cancer.

NOTE Confidence: 0.8763222

 $00{:}58{:}53.950 \dashrightarrow 00{:}58{:}57.398$ At that time, it was only for women,

NOTE Confidence: 0.8763222

 $00:58:57.400 \longrightarrow 00:58:58.693$ with varying cancer,

NOTE Confidence: 0.8763222

 $00{:}58{:}58.693 \dashrightarrow 00{:}58{:}59.986$ with Brad commutations.

NOTE Confidence: 0.8763222

 $00{:}58{:}59.990 \dashrightarrow 00{:}59{:}02.055$ Subsequently we have found that

NOTE Confidence: 0.8763222

 $00:59:02.055 \longrightarrow 00:59:04.120$ property hitters helpful for women

NOTE Confidence: 0.8763222

 $00{:}59{:}04.192 \to 00{:}59{:}06.447$ merges with with broccoli mutations,

NOTE Confidence: 0.8763222

 $00:59:06.450 \longrightarrow 00:59:09.036$ but with other mutations as well.

NOTE Confidence: 0.8763222

00:59:09.040 --> 00:59:10.510 Something called homologous

 $00:59:10.510 \longrightarrow 00:59:11.490$ recombination deficiency.

NOTE Confidence: 0.8763222

 $00:59:11.490 \longrightarrow 00:59:14.108$ And we now use pop inhibitors in

NOTE Confidence: 0.8763222

 $00{:}59{:}14.108 \dashrightarrow 00{:}59{:}16.190$ treatment and also maintenance,

NOTE Confidence: 0.8763222

 $00:59:16.190 \longrightarrow 00:59:19.298$ which means that some women take property

NOTE Confidence: 0.8763222

 $00:59:19.298 \longrightarrow 00:59:22.310$ matters when they're cancer free to prevent

NOTE Confidence: 0.8763222

 $00:59:22.310 \longrightarrow 00:59:25.150$ or delay cancer cells from coming back.

NOTE Confidence: 0.8763222

 $00:59:25.150 \longrightarrow 00:59:27.285$ But similarly to what I

NOTE Confidence: 0.8763222

 $00:59:27.285 \longrightarrow 00:59:28.566$ mentioned about immunotherapy.

NOTE Confidence: 0.8763222

00:59:28.570 --> 00:59:28.998 Similarly,

NOTE Confidence: 0.8763222

 $00:59:28.998 \longrightarrow 00:59:30.710$ it's not for everybody.

NOTE Confidence: 0.8763222

00:59:30.710 --> 00:59:34.544 It truly needs to be smart and and directed,

NOTE Confidence: 0.8763222

 $00{:}59{:}34.550 \dashrightarrow 00{:}59{:}36.680$ and cells should be studied.

NOTE Confidence: 0.8763222

 $00:59:36.680 \longrightarrow 00:59:37.961$ These specific mutations

NOTE Confidence: 0.8763222

00:59:37.961 --> 00:59:39.669 assessed and decision made,

NOTE Confidence: 0.8763222

00:59:39.670 --> 00:59:42.718 who really would benefit from these.

 $00:59:42.720 \longrightarrow 00:59:43.950$ Versus others glory.

NOTE Confidence: 0.8763222

 $00:59:43.950 \longrightarrow 00:59:46.410$ If you would like to add

NOTE Confidence: 0.8763222

 $00:59:46.410 \longrightarrow 00:59:48.740$ I think then Cynthia is

NOTE Confidence: 0.84832627

 $00:59:48.740 \longrightarrow 00:59:50.890$ able to speak. Sure, yes,

NOTE Confidence: 0.84832627

00:59:50.890 --> 00:59:53.470 I agree in terms of immunotherapy,

NOTE Confidence: 0.84832627

 $00:59:53.470 \longrightarrow 00:59:56.571$ that what we have available right now

NOTE Confidence: 0.84832627

 $00:59:56.571 \longrightarrow 01:00:00.467$ and the data that we have is that immuno.

NOTE Confidence: 0.84832627

01:00:00.470 --> 01:00:04.418 Therapy has a highest likelihood of success.

NOTE Confidence: 0.84832627

 $01:00:04.420 \longrightarrow 01:00:07.552$ If the tumor has certain characteristics

NOTE Confidence: 0.84832627

01:00:07.552 --> 01:00:10.620 such as mismatch repair deficiency,

NOTE Confidence: 0.84832627

 $01{:}00{:}10.620 \dashrightarrow 01{:}00{:}14.004$ you might hear that term or

NOTE Confidence: 0.84832627

 $01:00:14.004 \longrightarrow 01:00:15.696$ or microsatellite instability.

NOTE Confidence: 0.84832627

 $01:00:15.700 \longrightarrow 01:00:18.520$ So those type of changes

NOTE Confidence: 0.84832627

01:00:18.520 --> 01:00:21.340 happen a bit more frequently,

NOTE Confidence: 0.84832627

 $01:00:21.340 \longrightarrow 01:00:24.220$ and cancer such as endometrial

NOTE Confidence: 0.84832627

 $01:00:24.220 \longrightarrow 01:00:26.524$ cancers and colorectal cancers

 $01:00:26.524 \longrightarrow 01:00:28.670$ compared to ovarian cancer.

NOTE Confidence: 0.84832627

 $01:00:28.670 \longrightarrow 01:00:33.374$ But somewhere in cancers can have that.

NOTE Confidence: 0.84832627

 $01:00:33.380 \longrightarrow 01:00:35.612$ For ovarian cancers that

NOTE Confidence: 0.84832627

01:00:35.612 --> 01:00:37.844 don't have that feature,

NOTE Confidence: 0.84832627

 $01:00:37.850 \longrightarrow 01:00:41.609$ what we're looking to is probably going

NOTE Confidence: 0.84832627

 $01:00:41.609 \longrightarrow 01:00:44.728$ to be combination therapies where

NOTE Confidence: 0.84832627

 $01:00:44.728 \longrightarrow 01:00:48.964$ immunotherapy is combined with other agents.

NOTE Confidence: 0.84832627

 $01{:}00{:}48.970 \dashrightarrow 01{:}00{:}51.255$ Those that target the abnormal

NOTE Confidence: 0.84832627

 $01:00:51.255 \longrightarrow 01:00:53.083$ blood vessels of tumors,

NOTE Confidence: 0.84832627

01:00:53.090 --> 01:00:55.380 those that target DNA damage,

NOTE Confidence: 0.84832627

 $01{:}00{:}55.380 \dashrightarrow 01{:}00{:}58.098$ repair sometimes are drugs that target

NOTE Confidence: 0.84832627

 $01{:}00{:}58.098 \dashrightarrow 01{:}01{:}00.898$ DNA damage repair like PARP inhibitors

NOTE Confidence: 0.84832627

 $01{:}01{:}00.898 \dashrightarrow 01{:}01{:}03.628$ can actually lead to DNA changes.

NOTE Confidence: 0.84832627

 $01:01:03.630 \longrightarrow 01:01:06.666$ That makes the body's immune cells

NOTE Confidence: 0.84832627

 $01:01:06.666 \longrightarrow 01:01:09.271$ more able to potentially identify

 $01:01:09.271 \longrightarrow 01:01:12.694$ those cells as cells that need to

NOTE Confidence: 0.84832627

 $01{:}01{:}12.694 \to 01{:}01{:}15.479$ be illuminated by the immune cells.

NOTE Confidence: 0.84832627

01:01:15.480 --> 01:01:17.930 Um, so I do think there's promise.

NOTE Confidence: 0.84832627

 $01:01:17.930 \longrightarrow 01:01:19.954$ Other areas, of course.

NOTE Confidence: 0.84832627

01:01:19.954 --> 01:01:23.676 Um, that are of interest are even,

NOTE Confidence: 0.84832627

01:01:23.680 --> 01:01:26.896 you know, Speaking of HPV vaccines,

NOTE Confidence: 0.84832627

 $01:01:26.900 \longrightarrow 01:01:28.514$ other cancer vaccines.

NOTE Confidence: 0.84832627

01:01:28.514 --> 01:01:29.590 So potentially.

NOTE Confidence: 0.84832627

01:01:29.590 --> 01:01:30.510 I mean,

NOTE Confidence: 0.84832627

 $01:01:30.510 \longrightarrow 01:01:33.730$ I think right now everyone has is

NOTE Confidence: 0.84832627

 $01:01:33.730 \longrightarrow 01:01:37.090$ more educated than we could ever

NOTE Confidence: 0.84832627

 $01:01:37.090 \longrightarrow 01:01:40.575$ imagine about M RNA vaccines which

NOTE Confidence: 0.84832627

 $01:01:40.575 \longrightarrow 01:01:44.085$ are being deployed to combat covid.

NOTE Confidence: 0.84832627

01:01:44.090 --> 01:01:47.723 So it's a new technology of vaccination

NOTE Confidence: 0.84832627

 $01:01:47.723 \longrightarrow 01:01:50.060$ which definitely has promise.

NOTE Confidence: 0.84832627

 $01:01:50.060 \longrightarrow 01:01:52.750$ For cancer and personalized cancer

01:01:52.750 --> 01:01:55.918 vaccines as well, so you know,

NOTE Confidence: 0.84832627

 $01{:}01{:}55.918 \dashrightarrow 01{:}01{:}58.498$ basically stimulating the the natural

NOTE Confidence: 0.84832627

 $01:01:58.498 \longrightarrow 01:02:01.282$ immune response to recognize abnormal

NOTE Confidence: 0.84832627

01:02:01.282 --> 01:02:04.067 proteins expressed by cancer cells.

NOTE Confidence: 0.84832627

 $01:02:04.070 \longrightarrow 01:02:07.430$ So other areas of immunotherapy to

NOTE Confidence: 0.84832627

 $01:02:07.430 \longrightarrow 01:02:10.539$ include things like car T cells.

NOTE Confidence: 0.84832627

 $01:02:10.540 \longrightarrow 01:02:13.240$ So basically expanding a person's

NOTE Confidence: 0.84832627

 $01:02:13.240 \longrightarrow 01:02:17.050$ own T cells that can recognize.

NOTE Confidence: 0.84832627

 $01{:}02{:}17.050 \dashrightarrow 01{:}02{:}19.140$ Tumor antigens or tumor neoantigens.

NOTE Confidence: 0.84832627

01:02:19.140 --> 01:02:23.310 So I do believe there's a lot on the horizon,

NOTE Confidence: 0.84832627

 $01:02:23.310 \longrightarrow 01:02:25.390$ and these advances are being

NOTE Confidence: 0.84832627

 $01:02:25.390 \longrightarrow 01:02:26.638$ made possible by.

NOTE Confidence: 0.8780991

 $01{:}02{:}28.840 \dashrightarrow 01{:}02{:}30.148$ Much increased understanding

NOTE Confidence: 0.8780991

 $01:02:30.148 \longrightarrow 01:02:32.328$ of how these cancers develop,

NOTE Confidence: 0.8780991

 $01:02:32.330 \longrightarrow 01:02:34.840$ as well as new technologies

 $01:02:34.840 \longrightarrow 01:02:38.030$ that make it more efficient to

NOTE Confidence: 0.8780991

 $01:02:38.030 \longrightarrow 01:02:40.366$ to consider these modalities.

NOTE Confidence: 0.8780991

 $01:02:40.370 \longrightarrow 01:02:42.872$ So yes, I'll pause there for a second and

NOTE Confidence: 0.8780991

 $01:02:42.872 \longrightarrow 01:02:45.489$ we I see there's a few other questions.

NOTE Confidence: 0.8780991

 $01:02:45.490 \longrightarrow 01:02:46.995$ And then I think Cynthia

NOTE Confidence: 0.8780991

 $01:02:46.995 \longrightarrow 01:02:48.500$ had a question as well.

NOTE Confidence: 0.8651248

01:02:50.510 --> 01:02:52.990 It's in did you want to go ahead

NOTE Confidence: 0.8651248

 $01:02:52.990 \longrightarrow 01:02:53.920$ with your question?

NOTE Confidence: 0.8651248

 $01:02:53.920 \longrightarrow 01:02:55.160$ Can you hear me?

NOTE Confidence: 0.8651248

 $01:02:55.160 \longrightarrow 01:02:56.400$ We can oh wonderful.

NOTE Confidence: 0.8651248

 $01{:}02{:}56.400 \dashrightarrow 01{:}02{:}57.950$ Thank you so much doctors.

NOTE Confidence: 0.8651248

 $01:02:57.950 \longrightarrow 01:02:59.810$ This has been so very informative.

NOTE Confidence: 0.8651248

 $01:02:59.810 \longrightarrow 01:03:01.980$ I was asking the question about using

NOTE Confidence: 0.8651248

01:03:01.980 --> 01:03:04.150 birth control pills and not for myself.

NOTE Confidence: 0.8651248

 $01:03:04.150 \longrightarrow 01:03:06.630$ I'm 67. That ship has sailed but as

NOTE Confidence: 0.8651248

 $01{:}03{:}06.630 \dashrightarrow 01{:}03{:}08.987$ I say I had breast cancer in both

01:03:08.987 --> 01:03:11.290 breasts at age 52 an my I'm concerned

NOTE Confidence: 0.8651248

01:03:11.290 --> 01:03:13.754 about my 32 year old daughter Ann.

NOTE Confidence: 0.8651248

 $01:03:13.760 \longrightarrow 01:03:15.930$ My 35 year old daughter in law

NOTE Confidence: 0.8651248

 $01:03:15.930 \longrightarrow 01:03:17.790$ who's also her mother had breast

NOTE Confidence: 0.8651248

 $01:03:17.790 \longrightarrow 01:03:19.650$ cancer so when I heard about

NOTE Confidence: 0.8651248

01:03:19.650 --> 01:03:21.263 the birth control pills helping.

NOTE Confidence: 0.8651248

 $01:03:21.263 \longrightarrow 01:03:23.503$ The health of those two women.

NOTE Confidence: 0.8651248

 $01:03:23.503 \longrightarrow 01:03:25.750$ That's where my ears turned on.

NOTE Confidence: 0.8651248

 $01:03:25.750 \longrightarrow 01:03:28.353$ So is that the kind of information

NOTE Confidence: 0.8651248

 $01:03:28.353 \longrightarrow 01:03:30.208$ they should be talking to

NOTE Confidence: 0.8651248

01:03:30.208 --> 01:03:31.360 their gynecologists about?

NOTE Confidence: 0.8762509

01:03:31.930 --> 01:03:32.954 Yeah, yeah, you know,

NOTE Confidence: 0.8762509

 $01:03:32.954 \longrightarrow 01:03:34.490$ sending that alone is worth while.

NOTE Confidence: 0.8762509

01:03:34.490 --> 01:03:36.542 This one hour if you if this is what

NOTE Confidence: 0.8762509

01:03:36.542 --> 01:03:38.839 you heard and you're going to tell you,

 $01:03:38.840 \longrightarrow 01:03:39.860$ tell your daughter it's

NOTE Confidence: 0.8762509

 $01:03:39.860 \longrightarrow 01:03:40.625$ absolutely so thrilled.

NOTE Confidence: 0.8762509

01:03:40.630 --> 01:03:43.738 Thank you so so much. You know,

NOTE Confidence: 0.8762509

01:03:43.738 --> 01:03:46.370 so I think important thing not that of

NOTE Confidence: 0.8762509

01:03:46.441 --> 01:03:48.905 course to go into into your history,

NOTE Confidence: 0.8762509

 $01:03:48.910 \longrightarrow 01:03:50.932$ but very important thing is really

NOTE Confidence: 0.8762509

 $01:03:50.932 \longrightarrow 01:03:53.370$ just to to like know your risk,

NOTE Confidence: 0.8762509

01:03:53.370 --> 01:03:55.428 you know, like understand your risks.

NOTE Confidence: 0.8762509

01:03:55.430 --> 01:03:57.266 So for a family history like

NOTE Confidence: 0.8762509

01:03:57.266 --> 01:03:59.330 yours or history like yours would

NOTE Confidence: 0.8762509

 $01{:}03{:}59.330 \dashrightarrow 01{:}04{:}01.255$ be very important to understand.

NOTE Confidence: 0.8762509

01:04:01.260 --> 01:04:02.708 Again like genetic mutations,

NOTE Confidence: 0.8762509

 $01:04:02.708 \longrightarrow 01:04:04.518$ is there anything that predisposes

NOTE Confidence: 0.8762509

01:04:04.518 --> 01:04:06.750 you or your daughter to increase risk?

NOTE Confidence: 0.8762509

01:04:06.750 --> 01:04:09.904 And even if there was, you know like love,

NOTE Confidence: 0.8762509

01:04:09.904 --> 01:04:12.070 my women allowed my young patients

 $01:04:12.138 \longrightarrow 01:04:14.010$ whose mom said take care of.

NOTE Confidence: 0.8762509

01:04:14.010 --> 01:04:15.835 Always ask me while my

NOTE Confidence: 0.8762509

 $01:04:15.835 \longrightarrow 01:04:17.295$ mom had ovarian cancer,

NOTE Confidence: 0.8762509

 $01:04:17.300 \longrightarrow 01:04:19.596$ my mom had breast cancer or you

NOTE Confidence: 0.8762509

 $01{:}04{:}19.596 \dashrightarrow 01{:}04{:}22.408$ know I have a BRACHA gene mutation.

NOTE Confidence: 0.8762509

 $01:04:22.410 \longrightarrow 01:04:24.540$ Does that mean that I shouldn't

NOTE Confidence: 0.8762509

01:04:24.540 --> 01:04:26.420 be taking birth control pills,

NOTE Confidence: 0.8762509

01:04:26.420 --> 01:04:27.880 but it's the opposite.

NOTE Confidence: 0.8762509

01:04:27.880 --> 01:04:29.340 It's On the contrary.

NOTE Confidence: 0.8762509

 $01:04:29.340 \longrightarrow 01:04:32.260$ If the only time not to take it is if

NOTE Confidence: 0.8762509

 $01:04:32.339 \longrightarrow 01:04:35.177$ the woman herself has breast cancer,

NOTE Confidence: 0.8762509

 $01:04:35.180 \longrightarrow 01:04:37.352$ but the mom having breast cancer

NOTE Confidence: 0.8762509

 $01{:}04{:}37.352 \dashrightarrow 01{:}04{:}39.235$ or even having Braca mutation

NOTE Confidence: 0.8762509

 $01:04:39.235 \longrightarrow 01:04:41.748$ herself is the reason to take it,

NOTE Confidence: 0.8762509

 $01:04:41.750 \longrightarrow 01:04:44.018$ not not to take it because.

 $01:04:44.020 \longrightarrow 01:04:46.225$ Even for those women who have broken

NOTE Confidence: 0.8762509

 $01:04:46.225 \longrightarrow 01:04:48.301$ mutation and they have a significantly

NOTE Confidence: 0.8762509

 $01:04:48.301 \longrightarrow 01:04:50.086$ higher risk of being cancer,

NOTE Confidence: 0.8762509

 $01:04:50.090 \longrightarrow 01:04:52.449$ their risk also would decrease by 50%.

NOTE Confidence: 0.8762509

 $01:04:52.450 \longrightarrow 01:04:55.812$ So if somebody had a risk of 20% and they

NOTE Confidence: 0.8762509

01:04:55.812 --> 01:04:58.164 take birth control pills for five years,

NOTE Confidence: 0.8762509

 $01:04:58.170 \longrightarrow 01:05:00.529$ the risk will go down to 10%.

NOTE Confidence: 0.8762509

01:05:00.530 --> 01:05:04.100 You know, it's it's it's.

NOTE Confidence: 0.8762509

 $01{:}05{:}04.100 \dashrightarrow 01{:}05{:}05.940$ Its respective respective decrease so

NOTE Confidence: 0.8762509

01:05:05.940 --> 01:05:08.300 thank you for your question but yes,

NOTE Confidence: 0.8762509

 $01{:}05{:}08.300 \dashrightarrow 01{:}05{:}10.652$ you know the important thing is to

NOTE Confidence: 0.8762509

 $01:05:10.652 \longrightarrow 01:05:12.802$ know genetics to make sure that

NOTE Confidence: 0.8762509

01:05:12.802 --> 01:05:15.294 they're not at risk for something else,

NOTE Confidence: 0.8762509

 $01:05:15.300 \longrightarrow 01:05:17.897$ but that is not a contraindication on

NOTE Confidence: 0.8762509

 $01:05:17.897 \longrightarrow 01:05:20.379$ country that's even stronger indication.

NOTE Confidence: 0.8762509

 $01:05:20.380 \longrightarrow 01:05:21.998$ Thank you Lori.

01:05:21.998 --> 01:05:24.150 Can you see the

NOTE Confidence: 0.8057423

01:05:24.150 --> 01:05:26.840 question over there? Yes, yes.

NOTE Confidence: 0.8057423

01:05:26.840 --> 01:05:30.312 I I see question uh regarding HPV

NOTE Confidence: 0.8057423

 $01:05:30.312 \longrightarrow 01:05:33.502$ vaccination and yes one of the

NOTE Confidence: 0.8057423

 $01:05:33.502 \longrightarrow 01:05:36.172$ advances has been the expanded

NOTE Confidence: 0.8057423

01:05:36.172 --> 01:05:39.208 eligibility for getting HPV vaccine.

NOTE Confidence: 0.8057423

01:05:39.210 --> 01:05:43.802 So currently HPV vaccine Gardasil 9 is FDA

NOTE Confidence: 0.8057423

 $01:05:43.802 \longrightarrow 01:05:47.819$ indicated for ages 9 through 45 for boys,

NOTE Confidence: 0.8057423

 $01:05:47.820 \longrightarrow 01:05:50.912$ girls, men and women.

NOTE Confidence: 0.8057423

 $01{:}05{:}50.912 \dashrightarrow 01{:}05{:}54.777$ And so most efficacious considered

NOTE Confidence: 0.8057423

 $01:05:54.777 \longrightarrow 01:05:57.518$ on time for four.

NOTE Confidence: 0.8667831

 $01:05:59.530 \longrightarrow 01:06:02.626$ Children to be vaccinated by age 11 to 12

NOTE Confidence: 0.8667831

 $01{:}06{:}02.626 \dashrightarrow 01{:}06{:}05.735$ and there will be a very robust immune

NOTE Confidence: 0.8667831

 $01:06:05.735 \longrightarrow 01:06:08.569$ response and as a preventive vaccine.

NOTE Confidence: 0.8667831

 $01:06:08.570 \longrightarrow 01:06:10.928$ It prevents infection but has minimal

 $01:06:10.928 \longrightarrow 01:06:12.500$ effect on established infections.

NOTE Confidence: 0.8667831

 $01{:}06{:}12.500 \dashrightarrow 01{:}06{:}14.858$ So that's why there's lesser benefit.

NOTE Confidence: 0.8667831

 $01:06:14.860 \longrightarrow 01:06:17.471$ As one gets older and there's a

NOTE Confidence: 0.8667831

01:06:17.471 --> 01:06:19.487 higher likelihood of having been

NOTE Confidence: 0.8667831

01:06:19.487 --> 01:06:21.537 exposed to common HPV types,

NOTE Confidence: 0.8667831

 $01:06:21.540 \longrightarrow 01:06:23.505$ given that there's nine different

NOTE Confidence: 0.8667831

01:06:23.505 --> 01:06:25.470 types in the current vaccine,

NOTE Confidence: 0.8667831

 $01:06:25.470 \longrightarrow 01:06:27.978$ you know there is still probably

NOTE Confidence: 0.8667831

 $01{:}06{:}27.978 \dashrightarrow 01{:}06{:}30.915$ some benefit in many adults who have

NOTE Confidence: 0.8667831

 $01:06:30.915 \longrightarrow 01:06:33.673$ not had a chance to be vaccinated.

NOTE Confidence: 0.8667831

 $01{:}06{:}33.680 \dashrightarrow 01{:}06{:}36.270$ So it's an individualized thing I would.

NOTE Confidence: 0.8667831

 $01{:}06{:}36.270 \dashrightarrow 01{:}06{:}38.544$ I would suggest speaking with ones

NOTE Confidence: 0.8667831

 $01:06:38.544 \longrightarrow 01:06:40.709$ physician about the pros and cons,

NOTE Confidence: 0.8667831

 $01:06:40.710 \longrightarrow 01:06:42.560$ but definitely is a consideration

NOTE Confidence: 0.8667831

 $01:06:42.560 \longrightarrow 01:06:44.410$ for both men and women.

NOTE Confidence: 0.8667831

01:06:44.410 --> 01:06:47.680 Since you know many people.

 $01:06:47.680 \longrightarrow 01:06:50.650$ Of of the older age may want to have

NOTE Confidence: 0.8667831

 $01:06:50.650 \longrightarrow 01:06:53.132$ catchup vaccination because there was

NOTE Confidence: 0.8667831

01:06:53.132 --> 01:06:55.722 less availability or no availability

NOTE Confidence: 0.8667831

01:06:55.722 --> 01:06:58.943 at at during their their childhood

NOTE Confidence: 0.8667831

01:06:58.943 --> 01:07:01.043 and childhood vaccine schedule.

NOTE Confidence: 0.8667831

 $01:07:01.050 \longrightarrow 01:07:04.590$ So that's a great question.

NOTE Confidence: 0.8667831

01:07:04.590 --> 01:07:07.854 And and I think another question

NOTE Confidence: 0.8667831

 $01:07:07.854 \longrightarrow 01:07:10.782$ which Renee has addressed is

NOTE Confidence: 0.8667831

 $01:07:10.782 \longrightarrow 01:07:13.406$ eligibility for clinical trials.

NOTE Confidence: 0.8667831

 $01:07:13.410 \longrightarrow 01:07:19.570$ So Renee Place the Renee Goddard place the.

NOTE Confidence: 0.8667831

 $01:07:19.570 \longrightarrow 01:07:24.268$ Good websites to look for trials.

NOTE Confidence: 0.8667831

01:07:24.270 --> 01:07:26.148 Clinicaltrials.gov, for example,

NOTE Confidence: 0.8667831

 $01:07:26.148 \longrightarrow 01:07:29.904$ you can search by geographic location,

NOTE Confidence: 0.8667831

 $01:07:29.910 \longrightarrow 01:07:31.166$ cancer tie.

NOTE Confidence: 0.8667831

01:07:31.166 --> 01:07:37.770 You know what, what phase of clinical trial.

01:07:37.770 --> 01:07:38.702 And so,

NOTE Confidence: 0.8667831

 $01:07:38.702 \longrightarrow 01:07:42.430$ and then in terms of local clinical trials,

NOTE Confidence: 0.8667831

01:07:42.430 --> 01:07:45.636 Britney put the website up for the

NOTE Confidence: 0.8667831

01:07:45.636 --> 01:07:48.488 Yale Cancer Center website as well.

NOTE Confidence: 0.048152834 01:07:51.510 --> 01:07:52.380 Um?

NOTE Confidence: 0.89606816

 $01{:}07{:}55.060 \dashrightarrow 01{:}08{:}00.908$ Let's see. I think there was a question from

NOTE Confidence: 0.89606816

 $01:08:00.908 \longrightarrow 01:08:03.480$ Audrey about genetic mutations in 2017.

NOTE Confidence: 0.8455192

01:08:05.850 --> 01:08:08.244 So you know it's a good question.

NOTE Confidence: 0.8455192

 $01:08:08.250 \longrightarrow 01:08:09.622$ We always, you know,

NOTE Confidence: 0.8455192

01:08:09.622 --> 01:08:12.020 I'm a huge proponent of saying yes,

NOTE Confidence: 0.8455192

 $01:08:12.020 \longrightarrow 01:08:13.049$ you know, retest.

NOTE Confidence: 0.8455192

 $01:08:13.049 \longrightarrow 01:08:15.107$ If it was longer than 2017,

NOTE Confidence: 0.8455192

01:08:15.110 --> 01:08:16.558 I would definitely retest.

NOTE Confidence: 0.8455192

 $01:08:16.558 \longrightarrow 01:08:19.229$ 2017 was already the time where we did.

NOTE Confidence: 0.8455192

 $01:08:19.230 \longrightarrow 01:08:21.966$ We did this expanded to extend the panels.

NOTE Confidence: 0.8455192

 $01:08:21.970 \longrightarrow 01:08:24.028$ So you probably OK from 2017.

 $01{:}08{:}24.030 \dashrightarrow 01{:}08{:}25.398$ But anytime you you're

NOTE Confidence: 0.8455192

01:08:25.398 --> 01:08:26.766 even thinking about it,

NOTE Confidence: 0.8455192

01:08:26.770 --> 01:08:30.433 I always just urge just reach out to them.

NOTE Confidence: 0.8455192

01:08:30.440 --> 01:08:31.980 Genetics counselor where you got

NOTE Confidence: 0.8455192

 $01:08:31.980 \longrightarrow 01:08:34.186$ it done and then just ask them

NOTE Confidence: 0.8455192

01:08:34.186 --> 01:08:35.998 you know they they routinely get

NOTE Confidence: 0.8455192

 $01:08:35.998 \longrightarrow 01:08:38.038$ these phone calls and they can just

NOTE Confidence: 0.8455192

 $01:08:38.038 \longrightarrow 01:08:39.964$ glance at yours and make sure that

NOTE Confidence: 0.8455192

01:08:39.964 --> 01:08:41.349 everything that everything was done

NOTE Confidence: 0.8455192

 $01:08:41.349 \longrightarrow 01:08:42.700$ and there's nothing additional.

NOTE Confidence: 0.8455192

 $01:08:42.700 \longrightarrow 01:08:44.786$ If you had it done before 2014,

NOTE Confidence: 0.8455192

 $01:08:44.790 \longrightarrow 01:08:47.445$ I always hate to redo it, but we don't.

NOTE Confidence: 0.8455192

 $01:08:47.445 \longrightarrow 01:08:49.440$ We have so much more now that

NOTE Confidence: 0.8455192

 $01:08:49.509 \longrightarrow 01:08:50.769$ than we did before,

NOTE Confidence: 0.8455192

 $01:08:50.770 \longrightarrow 01:08:51.950$ but to only 17.

 $01{:}08{:}51.950 \dashrightarrow 01{:}08{:}54.359$ Most likely you are you up to date.

NOTE Confidence: 0.7976719

 $01:08:58.930 \longrightarrow 01:09:00.706$ Well, thank you so much everybody.

NOTE Confidence: 0.7976719

 $01{:}09{:}00.710 \dashrightarrow 01{:}09{:}03.142$ We had such a wonderful time with you

NOTE Confidence: 0.7976719

 $01:09:03.142 \longrightarrow 01:09:05.601$ today and we hoped to do this again

NOTE Confidence: 0.7976719

 $01:09:05.601 \longrightarrow 01:09:08.102$ and please reach out to all all of us.

NOTE Confidence: 0.7976719

 $01{:}09{:}08.102 \dashrightarrow 01{:}09{:}10.200$ I actually disposal in you so

NOTE Confidence: 0.7976719

 $01:09:10.200 \longrightarrow 01:09:12.000$ we always available to you.

NOTE Confidence: 0.7976719

01:09:12.000 --> 01:09:14.027 Thank you, thank you for having

NOTE Confidence: 0.7976719

 $01{:}09{:}14.027 \dashrightarrow 01{:}09{:}16.106$ a good day and thank you so

NOTE Confidence: 0.7976719

01:09:16.106 --> 01:09:17.880 much for organizing. Thank

NOTE Confidence: 0.80464596

 $01:09:17.880 \longrightarrow 01:09:20.295$ you Daniela, Gloria. Nice meeting you nice

NOTE Confidence: 0.80464596

 $01:09:20.300 \longrightarrow 01:09:21.684$ to meet you too.

NOTE Confidence: 0.80464596

 $01:09:21.684 \longrightarrow 01:09:23.418$ Thank you so much ladies.

NOTE Confidence: 0.80464596

 $01:09:23.420 \longrightarrow 01:09:25.152$ By have a great day.

NOTE Confidence: 0.80464596

 $01:09:25.152 \longrightarrow 01:09:26.533$ Alright take care everyone.

NOTE Confidence: 0.80464596

01:09:26.533 --> 01:09:27.219 Thank you

 $01:09:27.220 \longrightarrow 01:09:29.323$ for joining us.