WEBVTT

00:00:04.379 --> 00:00:08.216 - THC is delta nine tetrahydrocannabinol,

00:00:08.675 --> 00:00:12.095 which is the principal active constituent of cannabis.

00:00:12.095 --> 00:00:17.142 Without THC, there wouldn't be any psychoactive effects of cannabis,

00:00:17.434 --> 00:00:21.688 and the effects are dose related, as in the more THC in the product,

00:00:22.063 --> 00:00:25.066 the greater the effects, both good and bad.

00:00:26.484 --> 00:00:33.158 The content of THC in cannabis from the 1960s was about 4%,

00:00:33.658 --> 00:00:37.120 and then in 2016, it got up to about 16%,

00:00:38.079 --> 00:00:41.082 and now it's 35% THC content.

00:00:41.416 --> 00:00:46.129 Beyond cannabis itself, there are a staggering array of products,

00:00:46.129 --> 00:00:50.884 including concentrates that have a THC content of 95%.

00:00:51.301 --> 00:00:54.220 So when people think about cannabis

00:00:54.220 --> 00:00:58.683 and studies done on cannabis from the ‘60s and ’70s,

00:00:58.683 --> 00:01:01.269 where cannabis was 20 times weaker

00:01:01.269 --> 00:01:04.355 than some of the products that are currently available,

00:01:04.355 --> 00:01:08.443 they may not understand the risks of the currently available products.

00:01:12.781 --> 00:01:17.285 The mission of the Yale Center for the Science of Cannabis and Cannabinoids

00:01:17.285 --> 00:01:22.290 is to provide support for the highest quality research

00:01:22.290 --> 00:01:25.126 so that we can disseminate that to the public,

00:01:25.126 --> 00:01:29.089 to clinicians, to parents, to health policy experts.

00:01:29.589 --> 00:01:32.675 The other is to support the development

00:01:32.675 --> 00:01:37.514 of a new breed of young investigators who’d spend the next

00:01:38.264 --> 00:01:42.519 20 years of their careers studying the science of cannabis to

00:01:42.519 --> 00:01:43.853 to move the field forward.

00:01:46.815 --> 00:01:51.194 The methods and the approaches that are being used are very diverse.

00:01:51.194 --> 00:01:53.446 They go from molecular neuroscience

00:01:53.446 --> 00:01:56.950 all the way to asking someone with schizophrenia,

00:01:56.950 --> 00:02:00.453 “why do you use cannabis and what effect is cannabis having?”

00:02:00.453 --> 00:02:01.871 and everything in between.

00:02:02.956 --> 00:02:07.085 We find that heavy cannabis users have about

00:02:07.085 --> 00:02:11.506 a 15% reduction in the number of synapses in the hippocampus,

00:02:11.506 --> 00:02:15.343 which is that part of the brain that's really critical for learning and memory,

00:02:15.760 --> 00:02:18.721 and now we are looking at whether

00:02:18.721 --> 00:02:22.267 abstinence from cannabis in those people who are heavy cannabis users

00:02:22.809 --> 00:02:25.812 results in some recovery of the number of synapses.

00:02:26.229 --> 00:02:29.732 We also supporting a study that will use a technique called

00:02:29.816 --> 00:02:33.403 ecological momentary assessment, where we will have

00:02:33.945 --> 00:02:38.575 people with schizophrenia who will be asked to report in a diary

00:02:39.325 --> 00:02:43.329 how they are feeling at that moment and whether they've recently used cannabis.

00:02:43.329 --> 00:02:46.624 And that would allow us in a naturalistic setting,

00:02:48.042 --> 00:02:50.587 understand the effects of cannabis

00:02:50.587 --> 00:02:55.675 on the everyday lives of someone with a serious mental illness.

00:02:55.884 --> 00:03:00.096 So these are really important approaches that are useful on their own,

00:03:00.638 --> 00:03:04.017 but when they are combined, they are synergistic,

00:03:04.225 --> 00:03:09.772 and one of the great things about Yale is that we have such a breadth and depth

00:03:10.648 --> 00:03:13.026 of research expertise,

00:03:13.026 --> 00:03:15.820 technologies and methodologies

00:03:15.820 --> 00:03:17.864 that is really remarkable.

00:03:21.159 --> 00:03:22.535 The goal is to provide

00:03:22.535 --> 00:03:25.830 the highest quality evidence in either direction.

00:03:26.456 --> 00:03:31.461 If it if there is good evidence that cannabis, for example, is beneficial

00:03:31.461 --> 00:03:34.464 for certain medical conditions,

00:03:34.631 --> 00:03:38.343 and that's definitive, irrefutable evidence, great.

00:03:38.885 --> 00:03:41.804 If there is evidence that exposure to cannabis

00:03:41.804 --> 00:03:44.891 is associated with detrimental effects down the line,

00:03:45.350 --> 00:03:47.352 that would be important for people to know.

00:03:47.352 --> 00:03:52.148 At the end of the day, our purpose is in generating the highest quality information,

00:03:52.565 --> 00:03:55.777 and then what people would do with that information, it's really up to them.