

Audio file

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Transcript

Speaker 1

Recording in progress. Welcome to our fourth session of further experiments in artificial intelligence. I was just talking about the learning that I have been doing with the AIs and one of the, these are all math formulas that you see on the screen here. I can't tell, I can't remember exactly what it is, but I know this is now a polar grid system down here at the bottom of these shapes.

Speaker 2

James, can we interrupt a minute?

Speaker 1

Sure.

Speaker 2

So you're getting a lot of echo feedback, and I think it could be because someone has not muted their.

Speaker 1

Audio. It's me. I believe it's me. I don't know what the issue is.

Speaker 2

Do you have that monitor that you have on? Is that monitor maybe causing it?

Speaker 1

That could be. Let me turn this off. One, two, three. Maybe if I, it's this new. You can go over here.

Speaker 3

A couple of times I just had to turn my volume down and that took rid of the, got rid of the echo.

Speaker 2

Whatever you just did was. Holy mackerel, that's awful. One, two.

Speaker 1

Three. One, two, three.

Speaker 2

Still have the echo. Maureen, how close are you sitting to Jim? I'm downstairs and with the door closed. Okay. This is where I usually am. And you're not echoey. Yeah, that's interesting. Why don't you check your audio, the audio button and see where your microphone is coming from through Zoom. I see your.

Speaker 1

I'm really sorry for this. It's the first time we've experienced.

Speaker 4

Yeah, Maureen, you were very helpful. Although I don't know that it really looks like me, but I had fun with it.

Speaker 2

That's the great. Avatar. That's the word I was looking for.

Speaker 3

Maybe he needs to log out and log back in.

Speaker 2

Yeah. Well, first, I don't know if you looked at your audio source and the audio button. That's what I was suggesting. Yeah. But I don't know if he did it. Go to audio and go to select a speaker. Mine is on AirPods Pro. That seems to be working. And mine's on my MacBook Pro microphone.

Speaker 1

One, two.

Speaker 2

Still echo.

Speaker 1

One, two.

Speaker 2

Still echo.

Speaker 1

Take this in the other room. One, two. They'll echo one. I don't know what this called me. I really apologize, folks. I don't know if I can leave because I started them.

Speaker 2

Well, you can leave and restart it and everybody can come back in.

Speaker 1

No, that's too much.

Speaker 2

No, actually that would probably work just fine.

Speaker 1

One, two.

Speaker 2

Nope. Maybe you can sprint upstairs and see about his audio settings.

Speaker 3

What's so weird is that it didn't start up until, you know, when we stopped chatting, we turned the.

Speaker 2

PowerPoint on. Well, I can certainly turn the recording off and see if that helps. But I think it actually was when he started his PowerPoint.

Speaker 3

Okay.

Speaker 2

Does PowerPoint have a record or AI kind of thing on? Oh, that.

Speaker 1

Maureen, can you turn my sound off?

Speaker 2

Yes. I believe I'm going to remove the spotlight and then go to unmute. Okay, so I muted you so you're gonna have to unmute yourself because I can't I can't undo it.

Speaker 1

One, two, three, four.

Speaker 2

That sounds better. Keep talking.

Speaker 1

One, two, three, four. Yeah, it's gone. Okay, that's a learning.

Speaker 2

Look at all those avatars. What have I started?

Speaker 1

1, 2, 3, 4, 1, 2, 3, 4, 1, 2, 3, 4. I'm terribly sorry about that. That's a learning experience. It's a learning experience. So let's.

Speaker 2

They're very quiet. Your volume is really down.

Speaker 1

1, 2, 3, 4, 5.

Speaker 2

That's good.

Speaker 1

1, 2, 3, 4, 5. Need to share.

Speaker 2

All right, let's see if this.

Speaker 1

No, that's it. One, two, three, 4, 5.

Speaker 2

However, you're, let's see.

Speaker 1

Oh, the sound is, this is too much.

Speaker 2

All right. I had the option to mute your computer sound. You're muted.

Speaker 1

One, two.

Speaker 2

You're fine. Oh, it's good.

Speaker 1

Again, apologize, folks. We're going to start number two, share. Here's Part of the learning experience. These are all manual.

Speaker 2

Got something to do with this because you're echoing again.

Speaker 1

One, two.

Speaker 2

Have you gone down to your audio on Zoom?

Speaker 1

Where, I don't know where those are, there it is. Audio. Yes, I've gone multiple times to that.

Speaker 2

To the bottom left hand corner, audio.

Speaker 1

Yes.

Speaker 2

And you've got it coming through your AirPods.

Speaker 1

Yes. How about now? One, two, three, 4, 5.

Speaker 2

No, it's echoing.

Speaker 1

It's echoing. One, two, three, 4, 5.

Speaker 2

Still echoing.

Speaker 1

Echo cancellation. 1, 2, 3, 4, 5.

Speaker 2

Still echoing.

Speaker 1

1, 2, 3, 4, 5. 1, 2, 3, 4, 5. 1, 2, 3, 4, 5.

Speaker 2

Yeah, now there's a kind of a delay even.

Speaker 1

1, 2, 3, 4, 5.

Speaker 2

Yeah. No.

Speaker 1

1, 2, 3, 4, 5. It's when I turn this on. Is it 1, 2?

Speaker 2

Yes, it's when you go to Powerpoint your slides.

Speaker 1

Well, we'll have to learn. Let's see if I can try it once more. Turn off, share song and optimize for Sarah. 1, 2, 3, 4, 5.

Speaker 2

That's good. No echo.

Speaker 1

Okay. Wow, that's interesting.

Speaker 3

What did you turn off?

Speaker 1

On sharing the screen, you can share sound. And I've got a video that I'm going to have to exit and then re-enter here when I, if I show it. That took so long, I may not. Let's just move along.

Speaker 2

You're not in presenter view, though. Yeah, all we see your slides. Click the presentation view.

Speaker 1

Oh, you saw the wrong screen.

Speaker 2

No, we saw yours. There we go.

Speaker 1

I'm just so sorry, folks. Let's start it again from further experiments in artificial intelligence. Just to give you a clue of my learning, these are all math symbols that I've, this is a black hole distorting space-time. But as we're going to view a few AI actors today, And this is from the Guardian Weekly magazine. It has comparisons like this in the upper left here.

Each time. And this one caught my eye. It's comparing where do in the Venn diagram. How are AI actors in eating a chocolate egg? Common and they're just disappointingly hollow. is as you talk with AIs, you'll get them, you'll see their lack of substance to them. This is another one of the images that I've created. This happens to be the magnetosphere of Earth in one of the instances of it. But what I wanted to do, I had a number of questions about how I managed modification of this picture. You're seeing this picture of my mother from, I believe this is the early 1930s. Part of this process is how I've dealt with this. And I really wanted to try to go through this in front of you using Google Gemini. So what I did first is you can see me dropping the image into it and it there appears in the image. And then one of the things that I had to ask it is One of the things that I would like to do today is iterate on this image. Please make sure that I iterate and that you iterate as well. Restore, I'm going to turn it on again. Yes, restore this image for me if you would, please. So notice that it took the cracks out. Still has a few artifacts here in the lower images around the edges, but it took the cracks out of the image. Still notice here some here, some up there. So I'm going to ask it, please take the, please take cracks. One of the things that I've noticed as I do this is it becomes very important to save after each iteration. So notice that it took the cracks that were up here out of the image and it took the cracks down here that were out of the image. And let's see if I can do one more iteration. remove the dust marks from the image. And I meant to say out of her face. Again, remember, I am paying the \$20 a month for this version of it. So let's look at her face. Notice just in her face right here. I'll scroll back down. Notice it removed the dust marks here and from her cheeks and from her forehead. Now, one of the very most important things to do once you get to a very usable image, you have to say that and it downloaded it. Now what I would like to do, I'm going to feedback that it's good. Now I'm going to click on tools and let's see if it what happens when it goes to video. The problem is when you start, you have to go to a new image. So I'm going to close this a new chat. It's in video. Notice this right here that it's gone on to. Now the question for me becomes, can I go to Gemini to my download and capture this is it downloaded it. I'm going to put this in it. And then I'm going to say, please have, what's it called when you look at the side of a person's face? Profile. Profile file. OK. Now I've got to talk a little bit, but notice that I brought up the image. We did a number thing. It took out the original cracks, then it took out some more cracks that were in the picture. Then I removed the image, the dust from the face and let's see what happens here. I think what I've learned is this will only generate 7 seconds of video. So if you remember from the first discussion of videos, and it changed it some quite a bit. Notice the change that it made.

Speaker 2

That's because you asked for wind in the it brought down some hair that as if it was in the wind.

Speaker 1

Remember that there are. I think, in video there's between 24 and 30 images per second in the old filming. So I had a number of questions about that and I wanted to bring that up of how I did that. So that's amazing.

Speaker 2

It fills in the back and behind and it didn't have an image for that, right?

Speaker 1

I brought it in. I brought the remember that. Well, it's only a frontal image, isn't it?

Speaker 2

It doesn't have anything for the back. It just.

Speaker 1

Oh, yeah, it's it emulate it. I'm not sure how it does it. But.

Speaker 2

And what do you think your mother would say?

Speaker 1

She'd freak out. I think she'd cry. my brother, I've shown another image that I've done. Let's see if I can bring. I've done this image here and videoed it, cleaned it up, turned it into a video and sent it to my brother. And I don't think he's said anything to me about it. He might, he might not have even looked at it, but The thing that was shocking to me, I think this is a young teen here. This is like 13 years old in this image.

Speaker 2

And the other one that's different from what you did last week, what you showed us last week.

Speaker 1

Yeah, I know. Yes, it's that's part of the trick. I have not learned the technique, there is supposedly a way that you can supply the same seed, it's called SEED. So you have to seed an image. And if you supply the same seed each time, it will be the common image. But I have not really perfected that at all. So Again, this is I wanted to show Google Gemini that I'm paying for how I did that last week. That and I this is I have a fairly powerful computer. I don't think it was done done on my computer. I think it was done in Google's cloud. It

would only let me do three to five videos per day. I think you have to go up to the \$200 a month video to get the more than that. And then, you know, if you were in a design shop, as I call it, they would pay for things like this. Now, this image here that I foot and notice that it's on a polar grid system. This is part of what I've learned from the AIs is the different grid system. There's the Cartesian grid or most you used to, but there's also spherical grids. There's cylindrical grids. So this happens to be on the polar grid, and this is the distribution of a plasma from an ordered system into chaotic form. So there's a phenomenon in mass that when chaos occurs, that it occurs from a specific point from order to chaos. And this is one instance of a single point flipping into a chaotic scenario. I'm in love with this image. I've been trying to copy it, and it hasn't worked yet for me. I haven't been able to copy just the image itself. Oh, I've lost my... So what we're looking at now is, again, the taxonomy of hallucinations. We're in this part where we have to be very much aware of the hallucinations that AIs make. And this is an example of the material that I supplied and then asked an AI to expand upon it. And this is what it came up with. Plus, I asked Claude, which we're going to start to look at today, to put it into a PowerPoint. And that was saved me an hour, an hour or two of time to put it in doing this. But as I went through this, I see somebody's waiting to come in. I drew The bottom one here, watch for factual errors. These are the errors that I have experienced. Citations in legal documents. So I've wanted to look up some of the legal requirements for running for office. What the public officials, how are they supposed to behave? So if you're on the Ashland City Council, what are the legal parameters that you must ethically follow? And one of the problems that came up is the citations were inaccurate or were dated. The laws in Oregon change pretty regularly, so factual errors. Watch for those. One of the items that I've actually done is ask questions about things I have some knowledge of. This image on the left here is a transition from magnetic emanations to an analytical perspective on these emanations. You can see the emanations going here. So these are the types of errors that comes up. This one right here, the contextual, that is what I, as I was editing these, one of the issues that I noticed, contextual understanding is what humans use for humor. You have two different disparate understandings of the context, and you can apply those to human. But then I came across the beginning, the root of the two words, human and humor. I'd have to But this is good just to read through when you can have a little extra time to go through these. What were the other ones that I, oh, yes, this one down here, attribution and citations. This is extraordinarily important. A number of lawyers have been spanked big time for developing legal documents solely within AIs and then submitting it to a court. And then you need to be a judge means you read the citations that people submit and that people look them up and they're not there. So if you're doing anything like that, you got to check your work. You absolutely must. A code generation I have tried multiple times to use AIs to generate computer code, both Python and HTML. And some of them don't work. Regrettably, it's the

main one, ChatGPT from OpenAI has numbers, innumerable flaws. to the point where I had to throw my phone around because it was making so many errors. And the formatting capacity, I've encountered that innumerable times, is it says, oh, I've included the file that follows, or here is an example of it, and it doesn't post it. I've noticed that innumerable times. in the Gemini AI. Now, is there any questions that people might have about, oh, I got to go back. The questions about these hallucinations, I wanted to emphasize that because they still occur. The funny part about it, it's less than humans. humans make errors all the time. Humans hallucinate that they know things when they really don't. The bodacious braggart says that they know stuff when they really don't. I mean, humans make significantly more hallucinations in their speaking than AIs do. I think it's down to like 2 or 3% with the main AIs. But let's now, again, this is, I wanted to look at the Notebook LM, which is one of the suite of products that Google makes. I understand the original creators of Notebook LM from Google have moved and started their own company. But the Notebook LM is still out. Remember, Google does Docs. They do Sheets. They do, I forget what the slides are, the three products, just as Microsoft does Office, Excel, and PowerPoint. Notebook LM is one of Google's products. So I wanted to just look at it and I want to make some statements and we'll look at it, I hope.

Speaker 2

Before you go on.

Speaker 1

This is what you see when you press enter. Yes.

Speaker 2

Before you go on, Ray has his hand raised. Ray, did you have a question? Hi, yes, thanks. Regarding the citations, did you find Maybe perplexity is a little better at that. I don't know if it just gives more citations, but still gives errors.

Speaker 1

That I don't know the answer to.

Speaker 2

Okay.

Speaker 1

I have not used perplexity as much.

Speaker 2

Well, every time I use it, gives much better citations. And I think it's being used in the educational university environment as well.

Speaker 1

So just to comment on that, that's hot. And another thing that I've done is use AIs to check AI accuracy. So here's another one, go to Perplexity to see, to check an AI's work, copy its output to Perplexity and have it generate. So you can and dump files into the edit box and they say, please check this, which I will do with Claude when we get to it. But that's a good point. So, you know, there was a speculation that Apple might buy Perplexity. It was for sale for 10 or \$15 billion. that they were going to sell. And then they didn't sell it. That didn't happen. But this what we're looking at is the screen for notebook LM. When you log in, they'll have a couple of notebooks. I've got just a screen grab of it. This one right here is Union Pacific Railroad. the Elf Springs Homeowners Association. I dumped five or six of the Trump January 6th investigations in it. Here is the public trust documents from the Oregon Revised Statutes. So if you want to create a new Notebook, you click here. Then it allows you to upload your documents. You can specify Google Drive. You can link a website. I haven't done these things. You can put YouTube videos in it. You can copy and paste text into it by clicking down in this area. And this happens to be a picture. These are just pictures. These are not live. I'm going to go to live here in a second. These are what it looks like as the notebook LM is absorbing the material from the files that you put up. And it lists on the left side all of the documents that are in it. If you're on the free version, I believe it limits you to only 20 files. The paid version, you can put 200 files in it. And once it's in, this is relatively new. I've not worked with it, But look what you can do. You can have an audio overview. You can have a video overview. You can do a mind map. We'll try this in a live in a second. You can generate reports. You can ask questions, of course. You can ask questions as you go over it. I believe it allows you now to make a podcast. Now let me see if I can do this here. I want to go over to Notebook LM. This is live here. I guess it doesn't have the studio on the right side. You can see Let's just look here, public trust in Oregon. Oh, there it is. It shows up once you open a notebook. So this is a list of all of the documents that I downloaded it and I put them in here. It'd be interesting to discover if I could put A website, if I knew the public, there is a public body that analyzes all of these documents. If somebody violates public trust, there's a component of the Oregon government that will analyze whether it's true. But I, let's see, right let's see the uh let's go back see if I can go back go back sources no where do I go back oh oh up here I better so here's the what they've got earnings reports for the top these are just built in this is the one that I've use myself. Let's do a look at a couple of them. It's just, it's a collection of my Google Docs files from Google Drive. I just copied 150 Google Docs. So what I'm trying to get at is you can integrate the Google services with each other. But let's make a mind map let's see if it what

this does it's generating a mind map over here you can see that it's generating it it's pretty chaotic I can tell you here but let's see if I can ask it a question what Math functions and formulas have I collected. Let's look at this first and then go back. So this is querying. all of this information that I've put up there. Yeah. Imagine you're a reporter and you've collected innumerable open source information and now you want to ask questions about it. OMG. So these are, it's gone through all of the 156 and categorized them for me. It's put the formulas in here. And this, notice these math symbols, how it is being viewed correctly on the screen. I don't know if I can make it any bigger. This is latex, L-A-T-E-X, is what it's called. Oh my goodness, what had it actually brought stuff up. But so I just queried all 156 of these documents that I've put in here. But now let's look at the mind map. Oh, it's got a, oh, so no, this is, I'm not very, Imagine again that you're a reporter and you've looked up things on the same topic or a related topic. This is chaotic information there. But you could generate your points of discussion. OMG. Look at how it's, let me see if I can make that go down. Oh. AI prompt and it's nicely laid out. This is political and I guess it's not the place to discuss that. And then you get, oh, oh, MG, so Here's one of the other things. This happens to be a medical item that I've looked up. This is a protein that gets on human cells. And this is the nature of the issue that it deals with. So let's see if I can download that. Takes it a second. So there, OMG, this. You know, I'm discovering this for the first time. Here we are. I see, Maureen, there's a question here. And I'm going to, boom. This is, I don't, am I going to be able to close this? Yes. So I just put it down here on the right side. So imagine, just as the complexity of information that I've just put up here is, mind-boggling to me. And what I wanted to make sure is that you saw this tool. If you are a medical researcher, any kind of researcher, and you're developing your own materials, if you, like me, if you're asking innumerable questions of AI, and then copying the contents to Google Docs. So here I've asked 20 questions about a specific topic in an AI, different AIs copying the results to Google Docs. Then I can submit those 20 documents to Notebook LM and do this stuff. Any questions here? I'm going to bring back up. I think this is where the mistake will occur. I'm going to stop the share. I'm going to apologize here for the duplication of sound when it occurs because I'm going to turn on sound sharing and now go to the next one. So this is from a couple weeks ago when we take our break, which we're right on to. I'm going to make myself some tea in the background. This is from the NewsHour. And it has one of my favorite commentators. I actually sat next to him on a flight once in the way, way back. And I was in coach. I was working, a government guy in coach, of course. And here comes the Secretary of Labor and sits behind, actually behind me. And he was recognized by the stewards. And They came up to him and addressed him appropriately, sir, would you like to move to first class? He said, no, that would be inappropriate. I am on a government fare. I should travel as all government workers should. So that's a bit of my bias here as we watch Richard Rush is in this. So let's see, Maureen, tell me if the song comes up.

Speaker 5

AI is rapidly reshaping the workplace. More companies are turning to it as a substitute for hiring or retraining workers. And that's raising urgent questions about the future of the job market. For many families, the uncertainty can feel personal. What kinds of jobs will their children or anyone entering the workforce years from now actually have? Robert Reich is a professor of public policy at University of California, Berkeley, and the former labor secretary under President Bill Clinton. And he wrote about this recently in his Substack essay titled, How Your Kids Will Make Money in a World of AI. And he joins us now. Thanks for being here.

Speaker 6

Delighted. How are you, Jeff?

Speaker 5

I'm doing well. And I have wanted to speak with you ever since reading your Substack because of the really interesting way you categorize work. You say there are three categories of jobs, making, thinking, and caring. Which of these do you think is most at risk from AI and why?

Speaker 6

Well, the making jobs really have been automated over the last 30 to 40 years. You go into a manufacturing facility today and it's mostly computerized machine tools. The thinking jobs are the ones that are most at risk from artificial intelligence because artificial intelligence really will be automated. many thinking jobs. I'm talking about everything from doctors to lawyers, accountants, people who are and call themselves professionals who have got a lot of degrees, but whose particular thinking processes can be replicated and is being replicated by AI.

Speaker 5

What role do you see for education, universities, schools, vocational programs, and adapting to this new AI-shaped economy?

Speaker 6

Well, there are certainly going to be jobs in improving AI and in installing and servicing AI. There are going to be a lot of jobs, inevitably important jobs, in critical thinking and assessment. But many professional jobs, the kind of jobs that people have spent a lot of money to get professional degrees for, may not be delivering. Even today, a lot of computer engineering jobs have been essentially automated away by AI. So the job market is going to

change. Now, the caring jobs, the third category of jobs, the people who provide personal care, whether it's childcare or elder care, nurses, psychotherapists, people who are in the job of, if you will, empathy, their jobs will not easily be replaced by AI because the essence of caring jobs is humans, human touch, human contact, human caring. AI may pretend and convince some people that there is a human being operating on the other side of the screen, but Ultimately, human touch is going to be incredibly important.

Speaker 5

There was a time, though, when kids who had an aptitude for math or science were encouraged to learn coding. But with AI, to your point, making some of those coding jobs now obsolete, the ground has shifted. So what should parents be prioritizing today to best prepare their kids for the jobs of tomorrow?

Speaker 6

Well, I think the most important thing is versatility. That is, young people need to be able to learn rapidly, to move from job to job, to not assume that the old career paths are really there any longer. AI is going to jumble everything, and the trajectory of AI is almost impossible to foresee. So versatility, adaptability is going to be very, very important.

Speaker 5

What about the here and now? I'm hearing stories of recent college graduates who are talented, smart, and qualified, and yet they can't find work. To what degree is AI displacement responsible for that? And what options do they realistically have in navigating it?

Speaker 6

AI is undoubtedly replacing some jobs right now in computer engineering and in computer sciences. I would not recommend that somebody immediately leap into another graduate degree or a professional degree, becoming a doctor or a lawyer or an accountant or anything else. I think the most important thing is for people to really understand from the inside what it is that customers, clients, people actually need and be able to empathize with individuals. Again, the essence of caring jobs is empathy. And I don't believe that we're ever going to get to a point, at least in our lifetimes, where AI can replicate caring and empathy.

Speaker 5

Is there a policy prescription for this that would help alleviate some of the job market challenges? on the horizon?

Speaker 6

Inevitably, I think that universal basic income is going to become more popular because the caring jobs of the future that are going to dominate the future, given AI's tendency to automate so many professional jobs, those caring jobs are not going to be paying all that much. They don't pay that much today. And so the notion of a universal basic income that is gaining ground in many countries and has shown some promise in the United States may actually be a major policy in the future.

Speaker 5

In your new book, *Coming Up Short*, you argue that the baby boomer generation squandered much of the prosperity it inherited. Given that history, how do you see today's generation navigating the rise and the promise of AI? Is there a risk that they repeat some of the same mistakes and come up short in their own way? How can they best leverage the advances of this incredible technology?

Speaker 6

Well, there is obviously risk, risk of them coming up short as well. But I have enormous faith, Jeff, in the young people today. I have been teaching for 44 years. My most recent students and the generation of students I've taught over the last four or five years, they are more dedicated and committed to a better world. They are more willing to make the sacrifices that are necessary to achieve that better world and are more critically thoughtful. They not cynical, but they are at least realistic about the future than any generation I've dealt with before.

Speaker 5

Robert Reich, always a pleasure to speak with you. Thank you for your time.

Speaker 6

Thank you, Jeff.

Speaker 2

Anyone have any reactions to that?

Speaker 4

I saw a report recently that OpenAI and a consortium of banks, including JP Morgan and Goldman Sachs, are designed, have a kind of a secret project underway to emulate junior bankers decision process so they can replace all their junior, junior bankers with AI. And so I can see this model of taking a certain type of expertise that's very easily replicable and

and and doing the same thing to other types of lower level activities that actually pay a lot, but they're going to be displaced in the future. So that's just one example that I've heard of.

Speaker 1

Yes, it's happening multiple locations. Robert Reich brought it up. Junior programmers. They're not hiring junior programmers. I I don't know if you follow the news much, but there was.

Speaker 4

I think I need to forward it to my kids.

Speaker 1

Yeah, they're laying off off numbers of people, thousands of people. But what I want. I.

Speaker 2

Have Elena. Elena has a comment.

Speaker 3

One of the observations that I wanted to make is I've been talking to a fellow who's jumped into the AI. I've been using it for about two years. And he's in a job where he's doing public, public relations. He has to prepare every month for the commission meetings, for commission meetings. And he said his insight now is that what AI does is it makes you more productive. He can put in a huge packet of a whole lot of data, and he's using ChatGPT, put a whole lot of data in a packet and get the summaries out of it, verify in his own mind that the summaries are succinct enough that he can work with them, that that's really the summary. So it makes him more productive. He also was looking at some schematics for a new project. And he was able to lay in those schematics, look at what he thought were some of the pros and cons with your iterative part, reevaluate it. And he said the summary was, you know, as cities and organizations don't want to spend the money for more employee, but they want more services, he says the real point is using AI to be more productive. So that rather than taking five or six hours to go through a planning commission packet, you can summarize it much more succinctly by using AI and then leverage that knowledge you got with other pieces of knowledge to come up with your policies and your efficiencies. So I thought that was an insight about how AI can make you more productive.

Speaker 1

Augmenting human beings. instead of replacing them, augmenting. I think they're finding that's the case with radiologists examining X-rays and MRIs and CAT scans is that human beings benefit by having an AI to assist them to do the initial grunt work I call.

Speaker 2

Ty has his hand raised.

Speaker 4

Yeah, I was interested in making a comment on Robert Reich's note on the empathetic part of the human interaction. I agree to some extent, but let me give you a personal example. My daughter is a doctor of nurse practitioner in psychiatry, and she's got a DEA license and a lot of medications management and things like that. Obviously, that particular segment through the COVID side of the house has become very, very powerful. And 99% of her work is online. She's finding, and AI has helped her, for example, take clinical notes. So she has AI listen to her therapy sessions and then summarizes the activity so that what would take, you know, 1/2 hour to 45 minutes to an hour for an hour session is now 5 minutes of reviewing and typographic errors and making sure that it has the both context and content proper at the end of the therapy session. The other thing that she's observing is that there is a proclivity over the last, I would say 6 to 12 months for people to turn to ChatGPT for psychotherapy. And so I wonder how that fits into Robert Reich's comment about empathy. and how that might in fact turn out, it's going to take a decade for us to look back and see how the insertion of this technology has impacted human behavior. But there's two cases in one particular business paradigm where there's help and assistance and saving time and accuracy, as well as the thought that maybe some of the empathetic arts and sciences will also be eventually replaced.

Speaker 1

Tuesday's, yesterday's, this is the Wall Street Journal. No, this is the New York Times. Magazine, be prepared before seeking AI medical advice. So here's a lengthy article on that exact topic. And what I also want, it's impossible to keep up now. Here's from Monday's Wall Street Journal. They have a full section. I don't know how anybody can keep up. So here's five, six pages of information on this. My physician is always available and really gets me. Meet Dr. Grock. It's easier to cheat when you have, I mean, that's unbelievable. Yeah, volume. The Economist magazine. the use of super intelligence in economics. You know, this is, you know, 15 or 20 pages, I think it has in here on that particular idea. So it's becoming, you know, the point is there's so much information that you have to use in AI if you want to even try to keep up. But one of the things let's see if I can get to this and move quickly here is I wanted to show and I'll copy the video um into this area of the this is

materials this is that puzzle you can click on it and it brings it up Let's see if I can close it. I'm going to get a little bit lost here. Oh, sorry about that. The it will bring that stuff up. You can this I wanted to make sure to emphasize this to you. These two are the same. It's just the the looking at a form that can focus attention on a prompt. If you are a reporter, let's say, on open source information, this will help you focus on the type of things that you want to look up. So just to keep track of it, Google actually recommended the serious people to write down and track the information about prompts and I would agree I've gotten lost multiple times so again I want to emphasize this website the uh information that's available here are today's presentations that that I sent out to you And I changed it. This was from the previous week. This is session three that we did the different items that we're going to look at a little bit here in a minute. But there's this information as well. I'm going to quickly go through-- oh, I think I missed that. This is, I want to go through Notebook LM. We just went through this. We saw that. Now, just very, very quickly, I've emphasized this, I've exposed, I've submitted it to AIs and had it help me rewrite them. These are the features within all of the AIs. that you're going to look at. So whether you look at perplexity, whether you look at Google Gemini, we're going to look at Claude here in just a second, is these capabilities, these are very basic capabilities here. Follow up questions, correcting your text as you enter it. that you can drag and drop a file to it. This in Claude, can it create Word docs, Word documents, or PowerPoint presentation, or Excel files, O-M-G. Does it search the web? That would be RAG, remember, retrieval augmented generation. It goes out and looks at the web. Does it get real time information? This is again creative tools. The image on the right is part of my study of clouds. This is cumulo nimbus clouds and art style. This happens to be the impasto style, you know, where you daubs of oil paints. That's called impasto. Can it solve math problems? The elements that I've put on the screen is that capable of doing voice and audio, the interaction with a human being via voice. We've looked at that. I don't know we're going to have enough time to go through it today. Maybe. The collaboration, sharing with others, another important element, Google does it, is can you share information that you produce with the AI can and that was one of the things about the notebook LM is I'm going to try to share the with the people who have Gmail IDs I'm going to try to share that with all of the people that have Gmail IDs and their enrollment information. I'm going to share out the reports about the Union Pacific Railroad Yard that's on 4th Avenue and A 4th Street and A Street in Ashland by Noble Coffee Shop there. It's the railroad, the old railroad yard there that has a number of chemicals in it, mostly hydrocarbons, fuel. I share that with people a lot and show you that I can share that information. This one is, I will try to present it next week. Integrating with e-mail, browsing with office applications, with Google, Calendar, Google e-mail. I think that this Claude is perfected that. Safety features here. These elements that I wanted to go through. The editor. capabilities. So went through that very quickly because I wanted to move into

another one of the AIs more in depth than what I've done in the past. But remember, this is the mental model that I am urging you to develop when you approach a new AI. Remember, there's the sidebar, that is available. There's the prompt entry area. There's the response or major content area. And then there's the control elements. All of the AIs that we've looked at have that. Now we're going to look at Claude, which is from the company Anthropic. And next week I'll try to discuss a little bit the two major creators of, I think it's Dario and Daniela Amodei have put this together. They're from San Francisco. They worked for OpenAI and were alarmed that the gentleman that started AI, I'm not, I'm a little mind blank here, The guy that set that up, it was going too fast. He was not following safety rules. And so the primary function of Claude is safety. The models that they are releasing are safer. But notice, these are the elements that are on the mental model that we're approaching with of Claude. incognito. It will not remember the information that model is available. Here's what Claude looks like. We're gonna look at it in a second. Here's the sidebar of my past inquiries to Claude. What you're gonna find with Claude is, it does not do regular graphics. it will not produce the standard images. That's the big drawback, and I haven't figured that out why. But again, you can open and close that. You can create code. I don't know what projects is. This is all new as I've studied this for these presentations. I've come up with this stuff. Artifacts are, I asked it to create PowerPoint slides and it puts it in a separate box on the side. Maybe we'll have a chance to look at this. You can look at the different models that it will use. Opus is deep thinking. And again, I paid. 20 I paid \$200 a year for Claude deep thinking sonnet which is everyday quick answers from Haiku and I have not looked at more models what it might be earlier models Here's some other items. What kind of style will it use? I have not turned on extended thinking or research. I have turned on web search, which I've always thought was this RAG, retrieval augmented generation. You can have it search Google Drive. or Google Gmail. You're starting to get into some privacy exposure issues here. Plus you can, there's even more there. So notice the connect function here, allow you to connect to those. And here are the type of files that you can upload. I don't know what project is, we can look at those in a second. Let's look at Claude now. I'm going to bring this up. Excuse me as I do this. and I want to share it again. Share. Here is notice I can go in it incognito I can toggle the slide bar sidebar excuse me the different chats that I've had projects I which I don't know what that is artifacts Again, work oriented, you've got writing, slack. I don't know what's, I know what slack is, but I've never used it. It's allows offices to talk with one another. So these, oh my gosh. These are all of the artifacts that you can create. SVG, this is the graphics that it can create. I don't want to get into the difference between raster and vector graphics, but this will create scalable vector graphics. Looks at a calendar, e-mail writing, OMG.

Speaker 3

But when you said it wouldn't do graphics, you meant it didn't do images, but it will make vector, it will make graph, it will make vector and it'll make graphics.

Speaker 1

Which is different than images. It will make graphics, yes. Incomplete. I'll be honest with you. I thought that when I did it, I had to, there were many errors. Oh, here it would say here. is a vector graphics and it was incomplete. And I say, this is incomplete, please complete it. I'd have to go through that multiple times. So, and then here are the different models. Let's see if, if I can go down here, more models. Yes, it just went to earlier models. Here are the capabilities, different styles. Here's the different formats that you can get it to respond in. You can create styles that you can. This is down on the very bottom. I apologize that my bad. Let's see if I can scroll up. No, that's I have a problem here. there it goes up just a little bit. You can create styles. And here's the files that you can upload. I don't, what is project? Use a project. Start a new project. I'm not going to do that. So let's do a couple things here. I'm going to drag a file. This is the organization of economic cooperation and development. There, that's the 30 developed countries in the world that put together, it's an organization, non-governmental organization. And this one that I just put up is the EU, the European Union regulation on AI. So these are two large governmental type organizations, their AI policies put together. And let's please, I'm going to please generate 10 bullet points. these documents. So I believe the OECD document is 150 pages. The EU regulation, I believe, is 400 pages. Well, I don't know that you can see it on my screen here, but it's created an artifact here. I call it artifact. Let me let this finish and I will try to bring up the information. As somebody mentioned earlier, suppose that this is material that you're required to present to a governmental organization in the United States or Europe or Asia. And so you've somewhere you've had the AI summarize this information. Let's see if one this is done. I can copy it into a program and use it. Let's.

Speaker 2

Notice that there's a caveat just above your artifact. Do you see that?

Speaker 1

The EU regulates the EU regulation is difficult to extract text from. Let me create a presentation. Oh, so it, oh, there we go. So there you can see the artifact is on the right. OMG. That's, and you can do a couple things. You can download it. download it as a PDF. OMG, it's going to print it. Let's try that again. Oh, no. See, that would mean I'd have to go to my standard method on the Mac of saving it as a PDF. But let's.

Speaker 2

If you go back up there and and see if if under the printer it goes to Pdf. Try that.

Speaker 1

Oh, yes, it does. It does.

Speaker 2

So change the Epson to. Yeah.

Speaker 1

Save. That goes in my download folder. So there's a lot of information on the screen. And I can copy it. Let's see if I can. Here. Again, as I paid for this. This is the full. This has speaker notes in it. This is in it is in Taipora, which is a markdown. Remember, that's one of the vocabulary points is markdown. Let's see if I can download a markdown version. Notice MD. It brought it up again. But oh, it's over C on the left side here of this. is the mark. It's the old mainframe computers would write text with standard coding in it that would mean certain things. So 3 hash marks equals bold. slash plus hash equals something, a bullet point. So here is that complete document right here. And I can cut and paste this into a Word document, let's say, if I wanted to. I'm not going to do that right now. So this is a fairly length and it's fairly Transparent disclosure requirements from the OECD framework and the ECU Act. Here are the four, the transparency requirements. You know, they really don't know how AIs do the thinking that they do. Nobody knows how it's done. That's the concern. that we don't know how it generates the information that it generates. These people, what they found is once the size of corpus reached a certain point, the thinking expanded exponentially. This was in, and I'll discuss this next week, the book by Fei-Fei Li. She heads deep mind, I think, for Google now. She did ImageNet. They tried putting images of cats, dogs, cows, tables in a database and tried to machine language it into a comprehensible item. They went up to 100,000 image and it wouldn't, it couldn't tell a cat from a table. But then when they got to a million, images that had categories in it, categorized in humans, reinforced learning from human feedback. They had humans define tables, humans define cats. Once they got to a million images, the AI could identify, put an image in it, could identify the cat. It had an exponential increase in capabilities once it reached a certain scale in the corpus. So that's why hyperscale is assumed to be the step that will increase AI's capability into super intelligence. That's why Meta is building a huge, huge plant and data center in Florida. That's why XAI or Elon Musk is building a huge data center in Memphis, Tennessee. This is why Google's building a significant data center in Indiana. that's what these are going through. So let's see, did I have another one? I'm gonna pause. This is Claude that we're looking at. I wanted to do a, my voice interaction with Claude, but that's gonna be next week. We're gonna go look at the capabilities of Claude,

but I wanted to, one, we, Artifact. Here is the artifact. I will make it disappear here. This is. I can bring it back up. By printing it there. Notice how it embeds the artifact here. But we've reached the 90 minutes. here. I will put the interview in the top portion of this. If you go to Talks with Crows, this is what it looks like. And then wait a second, seminar materials down here will take you to it. I will copy and paste that whole interview. I think I've saved the video. I will put it in this area here. And you can go there and download this information. I tried, I'm very slow about this. I'll try to put the materials here if I get the time. So this is session two. you can get a bullet point of the materials. This is session two that we did. But let's go to questions. I'm going to stop the sharing. This is, again, talkswithcrows.com. I try to put material out there for people to download. at your convenience. This is extraordinarily intensive material. I started looking at these handouts. This is what Claude put together for me. I asked, I submitted material that I generated, then I ran it through Gemini. and had it expand upon materials. And then I asked Claude to put together a comprehensive, organized list. So it put all of the information. This is the AI editor capabilities. And it did all the layout. It did all of this tables and all that stuff. So that's next week that we're going to look at. I believe I put that in the information out there.

Speaker 2

All right. So you have a couple of hands raised.

Speaker 1

Could you let's let's answer the questions. You can call on a Maureen if you would.

Speaker 2

Carl.

Speaker 4

Did you have a question? This is a just a well. little bit of feedback on some of the comments that AI will increase productivity. And I think that's there's a lot of truth to that. But I think that there's also a chance that it could decrease productivity because if we're all using not if we're all basing our decisions on AI executive summaries of larger documents, we lose a lot of the knowledge that is in the full document. And the full document is valuable and in fact may be necessary.

Speaker 1

Yes. Yeah, that's a great point.

Speaker 4

And it's like if we're all using, if we're all using the Cliff Notes versions of everything, information quality will degrade. And the.

Speaker 1

College kids that the university professors are just starting to learn how to deal with students who write these papers and they haven't got a clue what They wrote, there's no integration into the mental structure of the human being. There is no problem. There is no nod about that. No question that that's going to happen. And AI slop, I think that's a developing meme. I'm not sure if I say that meme is slop. Is this slop? AI slot newspapers. What's the Ashland news is still a traditional human written element. That's they are a bullock bulwark against AI slot Ashland news. They have people go and sit in the city council meetings. and take notes and write summaries from their minds that I I don't know where the time is. any other questions, Maureen, that you can see there?

Speaker 2

I don't see anybody any other hands up. but other. Sorry, Karen. you got your real hand up. I'm looking for.

Speaker 3

Yeah, I was not able to find the way to do it with the raise hand thing. But anyway, you had mentioned in the Claude thing that you wanted 10. You gave that parameter to get 10 items, you know, 10 bullet points. Why wouldn't, could you have asked Gemini or whatever to decide how many bullet points there should be.

Speaker 1

Yes, you can. Yes, you can say you.

Speaker 3

Isn't that arbitrary to have given 10?

Speaker 1

I choose that because that's all I can process. You know, the, I'm going back to the 1970s here, but if you think about the number of digits in the original phone numbers. If you had a phone that was Cedar 57493, which is my old, that I, you know, as I can remember that from my childhood, Cedar 57493, 2357493, you can remember, the human mind can remember 7 digits. So Bell Labs, when they are putting dial phones together, came up with that number. So it is the ability there, the human mind has only a certain capacity to absorb

information. Okay. Seven was the number of digits that the Bell Labs determined. I try to go to 10 because That's all I can absorb. I can't absorb more information than that.

Speaker 3

Okay.

Speaker 1

Bringing up, it is arbitrary, yes.

Speaker 3

Okay. I just wondered what Jim and I would have chosen.

Speaker 1

Maybe I'll do a try to do a video of that to see if how many those two documents come up with in their bullet points. What I've been finding is that when I leave it to the AIs and some things, it only comes up with three or four.

Speaker 3

Oh, okay. Curious.

Speaker 1

You know, it can extrapolate to greater categories of organization. You know, if there's from those two documents that I submitted to Claude, if there are potentially 25 bullet points, Maybe the AI would extrapolate from those 25 to more. This one in the AI editor capabilities, it came up with, I think I left that to the AI itself and it came up with 12, 12 capabilities of the AI itself. and I, this is a little difficult for me to process. Of course, I'm OK, I was just curious about that. I think that as we age, our age-related mental capacities change.

Speaker 3

I like to tell that, showed up, but I just was curious about that. Okay, thank you.

Speaker 2

That's an example of don't get him started.

Speaker 1

Yes, quantum thinking. I call it quantum. I like to think at quantum level. That's one of my math studies is What are these quantum functions, the Hawking emanations? You know,

remember the gentleman, the Hawking guy that had to talk through a voice emulator? What was his first name? I can't remember. He postulated that black holes emulate plasma. that it's not only black holes absorb all of the material around them. There's also a function where black holes emanate a plasma. And what I've tried to have AIs generate is an image of that Hawking emanation.

Speaker 2

Are there any other questions out there? or comments.

Speaker 1

Thank you, folks. I appreciate my ability to present these to you. Studying this stuff is I'm learning more than my mind can absorb. Oh, and.

Speaker 2

More than 10 points.

Speaker 1

More than 10 points. Anybody with a Gmail address, watch for an e-mail from me inviting you to ask a question about the Union Pacific Railroad yard here in Ashland. Watch for that. Okay. Thank you.

Speaker 4

Thanks, Jane.

Speaker 1

Thanks. Interesting. Bye-bye.