📝 Notes

Dec 15, 2025

Tim / Mahault

Invited Tim Verbelen Mahault Albarracin

Attachments Tim / Mahault Tim / Mahault – 2024/10/15 12:24 EDT – Recording Tim / Mahault – 2024/10/15 12:24 EDT – Chat Tim / Mahault – 2024/10/15 12:24 EDT – Transcript

Meeting records Transcript

Summary

Mahault Albarracin expressed concerns about job security and a perceived lack of company trust in their ability to secure external funding, citing the closure of the Empathy Project, while Tim Verbelen maintained an optimistic outlook and noted their own limitations in securing funding. Mahault Albarracin updated Tim Verbelen on their multi-agent coordination work, detailing research into the recursivity problem in Theory of Mind (ToM) when agents are symmetrical, and concluded that an externalized cue or "social script" is necessary to break symmetry and avoid paralysis in simultaneous tasks, which Tim Verbelen suggested may be part of a generative model. They also discussed that ToM only works reliably if there is asymmetry between agents, and Tim Verbelen agreed to review and acknowledge administrative messages from Mahault Albarracin regarding research leadership channel tasks.

Details

Notes Length: Standard

- **Job Security Concerns and Optimism** Mahault Albarracin expressed feeling scared about potentially losing their job, noting that their skills are not as in-demand as Tim Verbelen's (00:00:00). Mahault Albarracin suggested that the

recent requests for time off indicate a financial struggle, which leads to their fear (00:01:47). Tim Verbelen maintained a more optimistic stance, acknowledging the situation but suggesting keeping heads down and that there is not much that can be done about it right now (00:00:00).

- **Limitations on External Funding and Support** Mahault Albarracin shared that they have established numerous contacts, including VCs and funders, but felt that the company would not trust them to bring in external funding. They cited the closure of the Empathy Project, which had a paying customer, as evidence of this lack of trust (00:01:47). Tim Verbelen noted that they also cannot bring in funding and is working on the Helix project, which Mahault Albarracin considered helpful (00:03:02).
- **Multi-Agent Coordination and Empathy Research** Mahault Albarracin provided an update on their multi-agent coordination work, an alignment project with similar principles to what they planned to do with Tim Verbelen (00:03:02). They explained their focus on the challenge of recursivity in theory of mind (ToM) when two agents are predicting each other, which often leads to wrong predictions if both agents have ToM. Mahault Albarracin created an environment with two agents, one having an "empathy factor" which is an alpha term determining how much the agent considers the other's expected future (EF) in its own rollouts (00:04:15).
- **Empathy, Asymmetry, and Recursivity in Theory of Mind** Mahault Albarracin's experiments showed that empathy helps, but what mainly aids coordination is knowing the other agent's empathy level, particularly when there is asymmetry. They found that ToM works well if agents are asymmetrical because they can predict each other reliably, but if they are symmetrical, recursivity causes the system to break down and become "not super useful" (00:05:32). Mahault Albarracin observed paralysis in the symmetrical agent experiments, leading them to conclude that an external pointer is needed to avoid the recursivity problem (00:06:48).
- **Need for External Cues and Social Scripts** Mahault Albarracin suggested that when agents are symmetrical and must coordinate simultaneously, they need to rely on externalized cues, such as a deontic cue or a "street sign," to break the symmetry (00:06:48). They argued that the recursivity problem is a bug that we have learned to solve through "scripts" or shared cultural artifacts that are external to both agents (00:09:26). Tim Verbelen questioned if this "externalized cue" is just part of a generative model, which Mahault Albarracin agreed with,

clarifying that they meant a common cultural artifact that forces a certain action and aids symmetry breaking (00:12:28).

- **Asymmetry and Planning under Theory of Mind** Mahault Albarracin noted that ToM only works if there is some degree of asymmetry, or else the agents step on each other's toes because they cannot plan effectively. They noted that planning under ToM does not work if agents have the exact same model and role (00:20:31). Tim Verbelen agreed this happens in real life, such as when people cross paths in a doorway, where one person must stop, which is a form of turn-taking (00:21:31).
- **Addressing Paralysis and Prediction in Simultaneous Tasks** Mahault Albarracin noted that their current experiment results in paralysis, where both agents predict that the other might do a thing and thus both stay put. Tim Verbelen suggested that the planning algorithm might be correct in recognizing that predictions are difficult due to insufficient knowledge in the symmetrical case, implying the need to seek information (00:24:45). Mahault Albarracin considered that the current deterministic policy sampling might be contributing to the issue, suggesting that stochastic sampling could introduce more probability over outcomes (00:25:42).
- **Project Repository and Implementation Details** Tim Verbelen mentioned that general ToM planning is difficult and non-trivial. Mahault Albarracin confirmed that they created a separate repository for this alignment project, which uses Jax and is not fully integrated with PIMDP (00:27:43). Tim Verbelen clarified that while the planning tree construction might be custom, rollouts and inference are essentially done using MDP (00:28:41).
- **Follow-up on Administrative Tasks** Mahault Albarracin requested that Tim Verbelen check and acknowledge the messages they sent regarding research leadership channel tasks to ensure they are completed. Tim Verbelen agreed to look at the messages (00:28:41).

Suggested next steps

- [ ] Tim Verbelen will check the messages sent by Mahault Albarracin on the research leadership channel and the private chat to confirm if the pointed tasks are complete and respond with a thumbs up.

📖 Transcript

Dec 15, 2025

Tim / Mahault - Transcript

00:00:00

Mahault Albarracin: Hey, how are you doing?
Tim Verbelen: Hello. I'm okay. I'm okay. Are
Mahault Albarracin: I'm okay, too.
Tim Verbelen: you
Mahault Albarracin: A bit scared, obviously. What about you?
Tim Verbelen: scared
Mahault Albarracin: Well,
Tim Verbelen: about?
Mahault Albarracin: we might be losing our jobs.
Tim Verbelen: I mean, that's what we signed up for, right?
Mahault Albarracin: I mean, it's easy for you, I guess, cuz you'll find a job easily. Your your skills are very in demand, but it's not the same for everyone. Like, obviously, I know you don't want this necessarily,
Tim Verbelen: There you
Mahault Albarracin: but uh it's just it's harder for
Tim Verbelen: go.
Mahault Albarracin: some than it is for others, I think.
Tim Verbelen: I mean, we'll see. That's how things go for as long as far as we know. We can still keep on
Mahault Albarracin: I know they say that,
Tim Verbelen: going.
Mahault Albarracin: but then the signs don't point to that, right? Like there Why did they ask you guys to take the time off?

00:01:47

Tim Verbelen: Well, I mean, because right now there's no money.
Mahault Albarracin: Exactly. I mean, there's no other way to look at it. So, your optimism is incredible, but like, yo, I'm f****** I'm I'm scared.

Tim Verbelen: Yeah,
Mahault Albarracin: Anyway, so Mhm.
Tim Verbelen: I mean there there's not that much you can do about it right now,
Mahault Albarracin: Yeah.
Tim Verbelen: right? Except for keeping your heads down and uh try to get somebody else.
Mahault Albarracin: Yeah. I mean, I wish I could help in that regard, but even if I do things that could help, I don't think they'll take them. So, you know what I mean? Well, I mean, so I've made a lot of contacts.
Tim Verbelen: No.
Mahault Albarracin: I know a lot of people. I know VCs and funders and all that kind of s***, but they're not going to take my stuff. like they barely they barely even trust me to to to find like the Empathy Project had a customer. We had a paying customer and they shut that down anyway.

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Mahault Albarracin: So like okay um I guess we're not doing that then you know so they they don't trust me to bring in stuff like fumblers or whatever. So I can't do anything to that effect. I can just watch
Tim Verbelen: Yeah, I can I can also not bring in fenders. So I can also just
Mahault Albarracin: Well, I mean, you're working on Helix.
Tim Verbelen: watch
Mahault Albarracin: That's the That's already helpful, you know.
Tim Verbelen: guess so.
Mahault Albarracin: Yeah. So, I mean, I guess the update this week is all just Helix,
Tim Verbelen: Anyway,
Mahault Albarracin: right?
Tim Verbelen: well, I I never really put the Helix updates as part of my team. It's just my like something I did on the side
Mahault Albarracin: No, I know.
Tim Verbelen: anyway.
Mahault Albarracin: But like your whole team is off right now, right?
Tim Verbelen: Yeah, pretty much.
Mahault Albarracin: Okay. Yeah, fair enough. Um Um Do you want to talk a bit about what I'm doing?
Tim Verbelen: Sure.

Mahault Albarracin: So, I've been um working on this multi-agent coordination thing.

00:04:15

Mahault Albarracin: Um this it's an unrelated project, but I'm I'm using similar principles. It's it's an alignment project. So, it technically sort of it's it's related to what I want to do with you, but um I I I've been really focused on it at the expense of everything else. Um, and you know that problem that if you have two agents that do theory of mind, the recursivity means they're always predicting each other wrong basically. Um, so you have to have one that has basically theory of mind and the other one that doesn't. Uh, which is what currently I think Riy is doing. Um, and I mean I've I've come to the point where I I created an entire uh environment that has multiple different setups. And the point is there's one agent that has more empathy than the other. Um so the empathy is just um an additional like basically an alpha term on how much you consider the other agents EF um as you do their rollouts and therefore how much you integrate it to your own. Um, and then you try to navigate an environment where you're going to have uh to either plan around the other agent, yield or do something like that.

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Mahault Albarracin: So, I'm I'm working on that basically. And empathy does help, but what mostly helps is um knowing about the other agents empathy. I.e., do you know whether we're symmetrical or we're asymmetrical? If you know that you are asymmetrical, then theory of mind works really really well because you can sort of assume that um you're going to take different actions. So you can predict each other relatively well. But if it becomes recursive if you're symmetrical, it becomes basically not super useful. Um or specifically um if you condition each other if you condition your actions on each other's actions i.e. there's a recursivity then it breaks down. If you don't do that, if you consider that um the actions are independent, then it works really well. That's fine. Uh but but eventually you have to coordinate i.e. you have to figure out a way to pass each other somehow. Um and then that's when it breaks. Um and so I've been playing around with that. I my my smaller experiments where the generative model is flat.

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Mahault Albarracin: Um those work well. There's the the agent understands he has to yield or one of the agent understands it has to yield and the other agent understands it can go forward when they're asymmetrical. Um when they're symmetrical there's paralysis. So I was like okay well maybe I need to figure something else out. Um but then I tested and yeah their theory of mine just literally just gives wrong predictions. So it's it's the the the solution I'm coming to is that there needs to be an external pointer. Um like communication would be too easy, right? So for example, what if I uh like even even if I communicate if I allow them to communicate um and they're acting simultaneously then um they would communicate the same thing if they're symmetrical, right? So then they would infer to do the opposite thing of what the other is communicating anyway. So it's pointless. However, if there's some kind and this is where I'm coming to the usefulness of scripts, i.e. when you know you're symmetrical with the other agent um and when you know you're going to come to a coordination area now you're going to have to to rely on externalized cues some kind of deontic cue like a street sign um basically that's this is the exact problem we come upon when we drive and it's the exact reason why uh there are rules of engagement uh say when you have a boulevard and you have to and you have to of

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Mahault Albarracin: people um pass the stop sign if they arrive at the same time. There's a rule about okay, well then it's going to be the person on the who arrived on the right first. Um because the the recursivity problem, it's not something we actually have to deal with. We've already understood that we um that the recursivity problem is a bug. It's not something that uh you have to that that that you that you ever have to solve. Um, and that's the Did you watch the movie uh Princess Bride? Okay. In it's it's a cool movie.
Tim Verbelen: No.
Mahault Albarracin: You should watch it. It's fun. Um, in that movie, there's um there's a very very famous scene where there's a guy who uh
Tim Verbelen: Heat.
Mahault Albarracin: gives um so so the the premise is um some mean people steal a girl and the guy has to go and fetch them. fetch the girl um from them. And so their one of the guys is supposed to be really really really smart.

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Mahault Albarracin: And so he tells them, "Hey, I'll give you the girl if you can beat me at this game." And the game is I'm going to put poison in one of these cups and you have to pick which cup you want to drink. And uh you have to figure out understanding me what cup has the poison in it. And so it comes upon like a a really really long um exchange about like I knew you would know that I knew you would know. So and that's the recursivity problem, right? Like there is no solving it because it's it's chaotic. As soon as you know that I know then you have to change your prediction and and then because I changed my prediction, then you no longer knew. So it's it's it's that's the that's the problem, right? Um and so the solution to the game was that actually both cups contain poison. It didn't matter what you did. and the guy um drinks either of the cups and would die and so the other one is like well I knew you would do that so anyway I've been drinking poison for 10 years and now poison doesn't affect me so it doesn't matter so it comes to the scripts right so I'm thinking of applying something like externalized um cues such that they can do theory of mind really really well and predict each other really really well

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Mahault Albarracin: so long as their actions are independent of each Um but as soon as they have to start interacting with each other in some kind of way um then they have to resort to something like a learned um cube and uh and that becomes the thing that allows them to navigate outside of the of the problem of recursivity. Um so yeah so that's that's where I'm at. Um also to your point earlier you were saying well you have to do turn taking in order to do theory of mind properly. Um yes because if you do turn taking then you've settled the actions so there is no recursivity right like you can just because you've done this now I know you etc. So the the the the problem sort of settles itself. But in simultaneous um tasks then it becomes about potentially avoiding the recursivity through these um uh known externalized um pointers that we both know entail something of both of us. Um, so yeah, and so effectively this I think this I think I lends itself to what I was going to do with you anyway because if we have these externalized um cues then or things like I'm talk I'm saying externalized it's kind of wrong but by externalized I mean shared cultural artifact which may not be something you see but it's something that's sort of outside of both of us which allows us to converge on that and not get into that recursivity.

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Mahault Albarracin: And so I feel like that can lend itself to this um this mapping we were talking about like how do you effectively um develop empathy for an agent who doesn't exactly share your model. Well, you have to in order to have some of the externalized cues, but the externalized cues will not be always on the same level. Um, yeah, something like that. It it won't be always on the same scale and therefore there's probably something to share, but not not enough to um not enough to get into um a full map overlap,
Tim Verbelen: like what you call an externalized skew. Isn't that just like a part of a generative
Mahault Albarracin: you know. No, it is exactly exactly.
Tim Verbelen: model?
Mahault Albarracin: So, so, so it's it's I'm phrasing it wrong. I've been thinking about this recently because I I've gone pretty far with a theory of mind, but now I'm faced with this with this problem and I'm I'm trying to figure out a way out of it. And so by by externalize I really just mean um a common um cultural artifact that forces something uh that we can both point towards like um in in like in the case of driving.

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Mahault Albarracin: So it it comes back to the necessity of having selfhood and and roles. Like you call it turn taking, but turn taking really just says it it's it's sort of implied that there's a selfhood in turn taking because now you've um you've assumed that there's a positionality to yourself. You may not identify it as such in the model explicitly, but um it's it's going to happen this way, right? you're going to force a form of of perspective taking in selfhood. Uh in the case that I'm trying to do where I'm I'm trying to not specifically do hard-coded turn taking um I think what needs to happen is you need to do a form of symmetry breaking through identification and through um specialization of some kind. And um in doing so, I think you get to place yourself within a social script that then allows you to navigate basically to just force this symmetry breaking even if you share as much of the model as possible.
Tim Verbelen: Yeah, but like at the end of the day, it's it's always just modifying your genative model to to be able to act in the world,

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Mahault Albarracin: Oh,
Tim Verbelen: right?
Mahault Albarracin: yeah. Absolutely. Yeah. Yeah. Yeah. Yeah. Did I say something that didn't imply
Tim Verbelen: No, no.
Mahault Albarracin: that?
Tim Verbelen: Uh the like the calling something either turn taking or some theontological rule or some external cue. It's at at the end of the day it all boils down to the same
Mahault Albarracin: Absolutely.
Tim Verbelen: mechanism.
Mahault Albarracin: And and it is very similar to the concept of turn taking. I'm just trying I'm trying not to bake in sequentiality is is what I'm is where I'm going with this. Like I'm trying like to to not make the agents you act then I act and then we we compute, right? I'm trying to do it more like assume you're simultaneous. what allows you to um make accurate predictions within a simultaneous framework um that that also allows you to coordinate and I think that implies something like we understand there is a known it it's like it's like a a regime change like you're doing with Helix a little bit but like there's a regime here wherein our predictions won't work well um because we get into this recursivity and so instead of relying on our predictions like we would normally at the lower level which is like I know this agent is going to go there there and there

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Mahault Albarracin: and because those those actions are fundamentally independent from mine. Uh there is no need for an interaction here. Um then we be we we come to the point where we we have to the problem I still have is that um long-term planning is kind of moot in that in that scenario right cuz I'm assuming okay theory of mind works very well if um if they're not quite interacting but the point is that they're supposed to plan around each other long enough, right? And so, um, so yeah, you you get to, um, you you have to break that a little bit if you're going to if you're going to assume that it works well if they're not interacting until they do. But I'm going to work with this possibility of a

regime shift. And then under that regime shift, um, what I can do is simply tell them, okay, well, you're kind of uncertain at this point. um this isn't a regime where in usually your predictions don't work anymore. And so you have to figure out a way to um map something in the in the in the environment that you can read that wouldn't be the the actions of the other the other agent cuz the other agent is going to read the same thing.

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Tim Verbelen: But then the mechanism that triggers the regime switch is equally hacking it in as like the turn taking
Mahault Albarracin: I mean,
Tim Verbelen: mechanism kind
Mahault Albarracin: yeah, exactly. It's it's still it's still um it's still effectively a form of um it's still effective. Well, well, that's what scripts are, right? scripts are effectively a form of hacking it in such that you don't have to get to um you know the the uh such that you can deal with the symmetry breaking. But like again this this is really interesting because it's only a problem if the agents have the same model. That's the problem. If they don't have the same model exactly i.e. if you change some of the parameters and they're aware of that then suddenly all of it works. like my um my empathy uh factor makes some of the agents act differently than the others because they're they're factoring their EF differently and then suddenly they're like, "Oh, well, okay, well, I know he's not going to yield, so I can yield." And then suddenly it all works.

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Mahault Albarracin: Um and it's like, you know what I mean?
Tim Verbelen: But but then the but then the other needs to make a correct inference about the empathy factor of the
Mahault Albarracin: So, yeah. Yeah, exactly. both have to.
Tim Verbelen: one
Mahault Albarracin: So right now what I'm doing is I'm passing uh the empathy factor as a fact. There's still it's still an inference technically because I want eventually to be like okay well what if you don't really know and what if you're left to learn it and what if you have to infer from cues but I'm not there yet right now. I'm like okay assume you just know it and uh if you do know it then suddenly you're like oh okay well he's kind of a dick

so I know that he's not going to yield. So if I want to coordinate considering him, I have to yield. If I if if he if if in the other way around, right? Um so it's that's that's a really interesting finding which is encouraging because you'd think, okay, well theory of mind only works if you have the same model, but actually planning under theory of mind doesn't work if you have the same model.

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Mahault Albarracin: It only works if you have some degree of asymmetry. And in in the case of asymmetry, there are many types. Like if we have the same model, but we have a different role, we have a slightly different model, and that means that okay, well, I know you're going to do something and I'm going to do something else. But if we both have the exact same model and the exact same role, then you get into like we're going to step on each other's toes. We literally can't plan because like I don't know what you're going to do. The only way to break that is to do something like t turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn turn taking taking taking where you're like communicating okay well I'm gonna do that but you can't communicate it at the same time because your reaction would be the exact same as the other one so it has to be like one of us has to communicate I'm going to do that and then you can make a decision to do something else but that only works if one of us speaks first not at the same time so turn taking

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Tim Verbelen: Yeah, I mean that's how it happens in real life as well,
Mahault Albarracin: But precisely. Yeah. Exactly. Exactly. Like we can't if we both It's It's the thing,
Tim Verbelen: right?
Mahault Albarracin: you know, when you're trying to get away from someone in the door, like you're you're you're crossing each other and you're going to the same side. At some point, one of us has to decide to stop and not move, which is effectively a form of turn taking. So I think it's interesting why turn taking is useful in a very specific context um to as a form of symmetry breaking but in any other circumstance which has any form of symmetry of of of asymmetry then suddenly the whole thing just works fine uh which I

think is an interesting result.
Tim Verbelen: Yeah,
Mahault Albarracin: So that's anyway, yeah, it's that's what I was that's what I was working on and I was going to tell you,
Tim Verbelen: cool.
Mahault Albarracin: but yeah, I I haven't lost in sight of the fact that what I'm really trying to do is um get to this um learning of the group modality and of and of different of of different models.

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Mahault Albarracin: I'm just right now experimenting with like this this empathy thing, which is working really well, better than I'd hoped. Um so that's that's encouraging. Um, and I'm also working with a theory of mind and trying to see um if I'm implementing the code correctly or if there's something I did wrong or like so right now I was just like um validating the predictions and so technically the the flow works but the predictions are wrong because they if they're symmetrical they they make different they take different actions than expected. Um so yeah. All right.
Tim Verbelen: But even if they're symmetrical and like your predictions which would would still be correct, right? you would just have like um
Mahault Albarracin: Well, no, because that's the recursivity aspect. So, it's like if I consider you in if I consider your actions,
Tim Verbelen: Mhm.
Mahault Albarracin: then my action is going to be that I considered your actions and therefore I know you meant to take A and therefore I should take B. But the other one is taking the exact same path of

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Tim Verbelen: But yeah, but then but then you but then you need to infer the the level of depth of thumb of the other as well,
Mahault Albarracin: prediction.
Tim Verbelen: right?
Mahault Albarracin: Exactly. And then Exactly. And so then you would add like okay so are we taking a different level of depth or like in which case one of us is going to be

wrong but the other one might be right. And it's like,
Tim Verbelen: Well,
Mahault Albarracin: okay,
Tim Verbelen: yeah.
Mahault Albarracin: well then you're
Tim Verbelen: But but but so even so even if but even if you even in the case that you like you don't know the other so you don't
Mahault Albarracin: you're
Tim Verbelen: know exactly at which level of to depth they are reasoning. This effectively means that even in your planning, you would consider both things can happen because if the agent is reasoning without Tom, they'll do this. If they have a tom one level, then they'll do this. If they have a tom two level, then they'll do that. If they consider me doing this and then if so, if you consider all these options, you'll work out that it's basically a 50/50 chance where the other will stay put and yield or still cross.

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Tim Verbelen: So the the planning algorithm doing is doing the right thing. It's just like you cannot predict what's going to happen because you have not enough knowledge.
Mahault Albarracin: Yeah,
Tim Verbelen: So you need to seek for
Mahault Albarracin: exactly. Yeah. Yeah. Precisely. So, so the thing is um in uh I mean maybe I'm doing it wrong,
Tim Verbelen: information.
Mahault Albarracin: but effectively what what ends up happening is usually paralysis. So they they both consider that uh the other one like they both consider that the other one might do a thing and therefore they both consider that it's better to stay put. Like that's it's it's uh which means ultimately they're predicting each other quite
Tim Verbelen: But yeah, but then well
Mahault Albarracin: wrong. Right. But like it's Yeah.
Tim Verbelen: no it depend they not necessarily predicting each other wrong. It's just like uh the sample that the other took was from from your model average, right? So anything could
Mahault Albarracin: I mean, I'll show you ultimately. Um,

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Tim Verbelen: happen.
Mahault Albarracin: but I think um I think I'm going to work on this a little bit more cuz I I think um maybe I I might be doing something wrong. I just want to make sure I'm sanity testing some stuff. Um, also right now, uh, my my policy sampling is deterministic, not um, not stoastic. So maybe that's part of it. you know, if it was stoastic, then there'd be more of a of a probability over um over the outcomes,
Tim Verbelen: Well,
Mahault Albarracin: whereas right now it's really just
Tim Verbelen: yeah. I mean, it's the same thing as as like now when two people want to say something at the same time in a
Mahault Albarracin: Mhm.
Tim Verbelen: in a Zoom call, like they just hold off and try again and hold off and try again.
Mahault Albarracin: Yep. Precisely.
Tim Verbelen: at some point they'll they'll sample a different a different uh hold
Mahault Albarracin: Yeah. Yeah. Yeah.
Tim Verbelen: off period and then it works again.
Mahault Albarracin: Yeah. Yeah.

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Mahault Albarracin: So, so that's that's something I'm kind of thinking about like whether I should have them learn and I the thing is I think they'll learn the same thing. So then we won't we're not escaping the symmetry problem. Um but maybe we would like I don't know. I feel like Yeah.
Tim Verbelen: Well, I I guess the symmetry problem will be resolved if if in your planning you take into account the proper average of all things that can happen and you accumulate uncertainty about well the other might do this or that I don't know anymore and the other does the same and then eventually your uncertainty about your next action becomes great enough that the sampling of that posterior will break the symmetry
Mahault Albarracin: Yeah. Yeah. Yeah. I mean, so so that's I can try with something like that. I I basically um I can try it. Do you at some point want to take a look at the repo to see if I'm like way out of left field or Oh, sorry. Uh, yeah.

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Tim Verbelen: What are you using right now?
Mahault Albarracin: Is it?
Tim Verbelen: Are you using the the
Mahault Albarracin: No, no, no. I made a different repo. You told me to make a different one. And besides, this was a very different uh project.
Tim Verbelen: Tom?
Mahault Albarracin: It was an alignment project. So, I thought, no, no, no. I'm going to I'm going to keep this separate. Um, but um but yeah.
Tim Verbelen: Well, it it it depends uh like it can be simplified if you if you code it up for a particular use case, but like the gener the general to planning has quite some difficulties that we had to uh um look into to get it working properly. And I I think we're still not 100% sure we've covered all the cases. So it's not that it's not a trivial to do it in general but depending on your use case it might be simpler
Mahault Albarracin: Yeah, maybe. I mean, I've I've realized that I'm dealing with some of these errors myself.

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Mahault Albarracin: Um, and also I uh I managed to make it work with Jax, which was really good, but that implied that I'm not quite using PIMDP. Um, which because I think your your current TOM code doesn't uh I think it it uses just a wrapper of the agent, but then everything else is uh is just injects outside of PIMDP, isn't it?
Tim Verbelen: uh well it is the factop because the sophisticated planning algorithm will be that will be the one in
Mahault Albarracin: Yeah.
Tim Verbelen: pdp.
Mahault Albarracin: Yeah. Yeah. Yeah. But that's but but but but you you you're going to put it in PMDP, but it it was your own thing for a while for now,
Tim Verbelen: Well, just just the way to construct the planning tree.
Mahault Albarracin: right?
Tim Verbelen: All the like all the codes to like do roll outs and to inference is just MDP
Mahault Albarracin: Yeah. Yeah. Yeah. Okay. Um, okay,

Tim Verbelen: basically.
Mahault Albarracin: cool. That's that's good to know. Anyway, I I I won't uh bother you any longer. Thanks for for taking the time to to chat with me. And um can you uh I'm you might have already, but just to make sure, can you check the messages I sent you and the ones that I sent on the research leadership channel and to to check if you've done all the things that I pointed to? And if you have, just thumb it up and I'll I'll be good. just because otherwise I have to keep thinking about it and returning to it and I never know if the task is finished or not.
Tim Verbelen: Yeah. Okay. I'll I'll have a
Mahault Albarracin: Thank you.
Tim Verbelen: look.
Mahault Albarracin: Appreciate you. Have a nice Is this the last time we're talking I guess
Tim Verbelen: I don't know. I'll be around. We'll
Mahault Albarracin: you'll be around but we won't have a meeting right cuz like we're going to go to the all hands but after that all the other meetings are kind
Tim Verbelen: see.
Mahault Albarracin: of cancelled.
Tim Verbelen: I don't know.

Transcription ended after 00:30:48