

Question Report		
#	Question	Answer
1	Does the Japanese government see a role for eFuels or is focus only on green hydrogen or green ammonia?	We have a national fund, Green Innovation Fund. From this fund, we have budgeted not only for hydrogen and ammonia but also for eFuel.
2	Hi everyone. Thanks to the organizers and speakers. Will the slides /presentations be shared after the meeting ? Thanks.	live answered
2	Hi everyone. Thanks to the organizers and speakers. Will the slides /presentations be shared after the meeting ? Thanks.	Yes. Presentation documents will be uploaded on our website after the webinar.
3	right, we do not see any .ppt material on screen.	
4	eFuel is wonderful transport fuel but after combustion of eFuel, CO2 is surely emitted but eFuel is much better than gasoline and transport diesel oil regarding CO2 emission. Am I right?	but it is carbon neutral as you take the CO2 in the production process out of the atmosphere and only put it in again in the combustion process.
5	Is there any impact of the war in Ukraine on your strategy and plans for LNG and H2 supply chains?	live answered
6	in the past, I know MAZDA had developed H2 combustion engine. How will they consider H2 combustion engine? I think this solution is more reliable than BEV.	Yes, we Mazda have experience introducing H2 engine in the past. and of course we are still thinking H2 combustion engine is one of good alternatives. I think the key for this becoming more popular is the infrastructure. we are keeping looking at that situation carefully to decide if we introduce it to market.
7	Mr. Ueno, don't you see any drawbacks for the wide spread and introduction of hydrogen applications related to safety for the enduser? For example public or private garages, houses, ferries, tunnels ? So additional H2 monitoring systems and H2 monitoring infrastructure need to be implemented everywhere. Isn't it a very huge effort?	Good point. H2 is not an easy molecule to handle. we need to have a special caution when we handle H2. AL can provide best in class safety, technical know-how and reliability, based on long standing experience and existing operation. We would like to ensure safety of using H2 working closely with partners including OEM
8	Question to Air Liquide:	
9	Monika san, you mean to apply DAC to extract CO2 from air	yes

10	Where do you get the renewable electricity? In Europe we will have the "additionality" which means you can not take electricity out of the grid, but build up your own renewable plants like wind or PV	in Chile there is more wind, in Marokka or Australia and other countries more sun. We import at the moment 60 % of fossil energy into Europe, why not renewable one in a transportable form like e-fuels
10	Where do you get the renewable electricity? In Europe we will have the "additionality" which means you can not take electricity out of the grid, but build up your own renewable plants like wind or PV	We mix some of energy sources with a long term Power Purchase Agreement. Here is the example of REN PPA in Europe. https://www.airliquide.com/group/press-releases-news/2021-07-26/air-liquide-signs-new-power-purchase-agreement-renewable-electricity-belgium
11	Toluene works similar to the LOHC (liquified organic hydrogen carrier)?	Yes. MCH/Toluene is indeed one of LOHCs.
12	I would raise the same questions to Mr. Kogure: is there any impact of the war in Ukraine on your strategy and plans for H2 supply chains?	I think the Ukraine crisis accelerates introduction of hydrogen to the economy, as we can see under REPowerEU initiative and so on. That said, there is no significant impact on MC's strategy in terms of hydrogen business deployment in Europe.
13	Thank you!	
14	I assume to use CO2 from CCU not DAC for producing eFuel	In our opinion (eFuel Alliance) all available CO2 sources should be considered. Next to DAC also not avoidable point sources can be used like from cement, glass or steel plants. If those concentrated CO2 sources exist, it would make more sense to use it as well. But you are right, in rural regions we will primarily use DAC.
15	Matsue san	
16	thank you very much. I personally strongly support H2 combustion engine because existing excellent combustion technologies are retained and big existing employment can be secured. Instead of BEV, China cannot keep us with combustion technologies sufficiently. So we can keep our superiority to China.	thank you. we think the combustion technology is one of our strong points so that as long as possible, we would like to make contribution with combustion technology together with electrification. we will introduce right product to each market and keep contributing for carbon reduction and neutrality.
17	METI/NEDO: which concrete projects for international cooperation do exist? How much money is allocated for this part of the Japanese H2-strategy?	LH2 transport project with Australia is one of them. We also start tech demo project at port of LA (Fuel Cell truck, any other port application). In 2021, NEDO allocated 200 million Euro for Fuel Cell and Hydrogen R&D, it is not including subsidy for HRS, FCV.
18	what is the view of using the green corridors for marine transportation as mentioned during COP 26?	Green corridors are an important concept -- they provide an arena for promoting co-creation throughout the value chain that can accelerate the transition to zero-emission shipping - we could imagine for instance green corridor between hydrogen valleys in ports allowing the shipment of green hydrogen production in certain locations all across Europe or even globally

19	The Japanese experiences with LNG and H2 supply chains will surely be of even higher interest for the EU countries in the current situation.	Thank you. As you mentioned, we established the first commercial LNG supply chain from Alaska to Japan. I recognize that long-term contracts and financing played an important role at that time. We would like to make use of such experience.
20	I think aircraft will finally adopt H2 combustion. AIRBUS is intensively developing H2 engine. From the view point of material recycling and sustainability, H2 combustion is far better than BEV. It is very difficult to completely recycle materials contained in battery including hazardous chemicals.	In the annual work programme of the Clean Hydrogen Partnership we are supporting 3 calls for the building blocks - sustainability and recyclability by design is included as of the beginning of the R&I
21	Dear Dr. Ohira can you kindly comment the timeline for these power plants you have shown say 10 MW.	10MW alkaline Electrolysis has been developed by Asahi-Kasei.
22	Will the recording be available?	Recording will be available on our web site but it will take a week to be uploaded at the following site; https://www.eu-japan.eu/events/next-hydrogen-generation-efuel-power-green-transition Japanese web site: https://www.eu-japan.eu/ja/events/cishidairanliao-shuisuefuelkacusutuotansu It will appear at the gray box at the right side of the page.
23	Hello and thanks for the great presentation,	
24	Thanks	
25	Thanks Mr Philipp for the presentation. Couple of question: How do you manage the intermittence of renewable energy to operate 24/7	Thank you for the question. We use thermal energy storage to enable 24/7 renewable heat supply to our process. Our process runs with heat instead of electricity.
26	Mr. Furler, what is the economic difference between your eFuel production approach and the eFuel production approach using PV+Wind+electrolyser+reformers?	
27	What is the Carbon or CO2 conversion that can be achieved with your technology? Thanks in advance	
28	What do you expect H2 destination will be? e-fuels fully compatible with existing engines (such as HVO, or others), engines with modifications, or what?	

29	I think we need to share the development process and critical technologies related to hydrogen utilization. Critical technologies can change with progress and status, but is there a shared table or organization for such real-time technology status?	
30	Thank you, Are you as well looking into other methods apart from alkaline electrolysis	
31	Hello and thanks for the great presentations, I'd like to ask a question to Luca Polizzi: What do you think of hydrogen from wastewater? Would it be a viable option for the european decarbonization?	
32	Mr. Pedinian, which technology are you using for DAC and what is the estimated power consumption per kg_CO2?	Mr. Schuele, for the Pilot plant is Global Thermostat, I don't have the number in hand. For future phases we are open to other technologies
33	Very interesting presentations. What is the difference of price between e-fuels and fuels ?	eFuels are more expensive than fossil fuels, but you cannot compare them equally. For comparison, you need to include a price of the CO2 externality as another attribute of the product. When doing that, eFuels are competitive to other CO2 neutral alternatives.
33	Very interesting presentations. What is the difference of price between e-fuels and fuels ?	In the future we expect that the eFuel price will drop closer to current fossil levels.
34	DAC will be indispensable when we use efuel as carbon neutral fuel. If so, cost reduction of DAC will be crucial.	
35	Is there a Phase 2 planned for Texas and Australia?	Yes