

Minutes of the ESG Conference 2021

November 26, 2021 AISIN CORPORATION

- Q1. I think Toyota Motor Corporation and other global OEMs have different approaches to electrification, but what do you think of the overall electrification strategy based on understanding the opinions of both parties?
- A1. I might talk about Aisin's approach to carbon neutrality or electrification once again. Customers' needs for carbon neutrality have become extremely strong in the last year or two. This must be dealt with in terms of both products and production, not only CO₂ emissions generated during driving, but also materials, production, disposal, recycling, and how to produce electricity and energy. There are some things that cannot be solved by one industry alone, and we have to consider all of them. In the case of Aisin, we do business in many regions. So, while dealing with the energy situation and regulations in each region, we have to respond to the needs of Toyota Motor Corporation, other global OEM customers, and end-user customers.

A troubling aspect, and it was the same when I worked at Toyota, is that it is very difficult to look ahead, especially regarding the areas of energy and regulation, which have not been settled yet, so the future is uncertain. Since the future is uncertain, it is easy to narrow down to focus on some things in terms of resources, but it is very risky from the viewpoint of business management. It means that we will not be able to provide products and services to the many customers with whom Aisin is associated.

Therefore, I say the same thing every time, but I think we should have a full lineup of electrified systems, making each one competitive, and realizing flexible and efficient production against fluctuations in production volume. The key words are high efficiency and miniaturization, which were also mentioned in the presentations from the three vice presidents today. This applies not only to the product aspect, but also to the plant lines and equipment. That is Aisin's strength, and it is based on Aisin's manufacturing, which has long produced A/T and provided such products to Toyota Motor Corporation and other global OEM customers. Basically, we would like to utilize this advantage first, and then work together to deal with any shortcomings.

- Q2. Given your strengths and weaknesses as an A/T manufacturer, how are you trying to address the resources and efficiency issues for producing both A/T and eAxle together?
- A2. Aisin's competitiveness lies in high efficiency and miniaturization, and we are going to focus on these two areas.

High efficiency and miniaturization will improve electricity costs, reduce battery consumption and CO₂ in production, and lead to resource saving and waste reduction. I think they are indispensable factors for electrified vehicles. For achieving this, Aisin's unique strengths are the many A/T gear and lubrication technologies that we have been produced over 50 years and that have been bought by many customers. They have much in common with eAxle technologies. In addition, in 2004 Aisin became the first specialized manufacturer to introduce HEVs. The motor technologies and cooling technologies that were cultivated through this effort are very interrelated with the development of eAxle, and we have already accumulated a lot of knowledge. If these resources and technologies can be used well, it will be very effective in terms of development.

In terms of production, by diverting the existing A/T equipment, we will limit the investment needed and form compact lines. Furthermore, for eAxle, where the needs of the market may change rapidly in the future, by creating line configurations that allow products incorporating new technologies to be mixed in various models, we will solidly keep not only development resources but also investment low to achieve high competitiveness. These are Aisin's strengths, and we are envisioning such an electrification strategy.

I think the cost will basically decrease if the size is reduced, so please look forward to it.

- Q3. I have a question about human capital related to the recent business integration. Regarding the KPI of the employee motivation index disclosed in the Aisin Group Report, the result was slightly lower than the target value in FY2020. What are your thoughts on this point? Do you think that there is no problem if you continue to work on job satisfaction as you explained? Please explain about the enhancement and expansion of human capital.
- A3. Regarding the employee motivation index, I was agonized when setting this target value, KPI. I wondered how to quantify employee motivation and whether to believe only the numbers, but I am thinking of setting this index as a starting point and linking it to some measures.
 - About last year's figure, I think we will have to continue our activities based on a longer time frame, until 2030, without worrying too much about the results of a single year. However, I believe that the business merger was one of the factors why we could not achieve the target in the last fiscal year. We announced the merger and started preparations in FY2020, and merged in FY2021. Even though the two companies were in the same group, two different companies became one. So, it is a fact that there are some worries, anxieties, and dissatisfaction among the employees. Regarding this point, both the labor union and us, executives, have listened to various opinions from each department and responded in the form of explanations at venues like "1on1MTG" as explained in the presentation.

In any case, I think we have to keep on making these efforts.

- Q4. Regarding the number of electrified vehicles by 2025, is it correct to assume that the second generation will secure the number of vehicles by 2025 and the vehicles will be equipped with DENSO inverters? Based on this, I think the development competition for 2025 has started, so please tell us your chances of success. Looking from the outside, it seems that small rather than medium is more likely to be requested from OEMs to other companies. If a certain amount cannot be secured in a place where price competition is waiting like in China or with Nidec, it will not lead to receiving orders for medium afterwards. Do I understand correctly that there is a good chance of success if you promote high efficiency and miniaturization? Please tell us what kind of field you are going to approach and how you will grow in the medium- to long-term.
- A4. Regarding the eAxle inverter, we are working in collaboration with BluE Nexus, so I hope you will understand this point.
 - About the odds of success with an eye on 2025 and beyond, the points of high efficiency and miniaturization that I explained today are very important factors for electrified vehicles. In addition to the knowledge and technologies that we have cultivated in the past, we intend to offer competitive products by incorporating challenging new technologies. We are pushing forward with development looking to the second generation, the third generation, and beyond, and we will direct development resources toward realization. As I explained so far, we would like to continue to meet the needs of many customers with a full lineup of electrified units, that is, a wide range of products, such as small, medium, and large, just like conventional A/T.
- Q5. I think that some other eAxle makers will compete on price, and some will add software to shorten the development period and combine with improved electricity costs. Including the field of small, do you think there is a chance of being competitive?
- A5. We will continue to offer a lineup of small, medium and large. Also, we are in charge of the area of control, and we can make various proposals that suit the needs of our customers, so I think we can assuredly be competitive.
 - Whether or not we can offer products in the field of medium will depend on how competitive we can become as we proceed concretely with the actions I explained today. For example, if a 10% improvement in electricity costs can be achieved, it means that the battery will be reduced by 10%. This brings a greater advantage to our customers than cost competition. Some people often say that eAxle equals just cost competition, but I don't think so. I think Aisin's strengths include, we can add software and DX to shorten the development period, or, like the development of conventional A/T, we can work with customers as one group to create products. Furthermore, since Aisin has various systems, we can propose cooperative effects with other systems such as brakes, and we can meet a wide range of customer needs. Some customers

want only the product alone, while others want to work on a large part of a vehicle together. We will proceed in a way that meets customers' needs, so please look forward to it.

- Q6. Regarding the environment, we received a detailed explanation focusing on the production aspect. It is an issue for Aisin as well as for the entire automobile industry, but the area of SCOPE 3 seems to be very large. I think it is not yet difficult, but if you have any strengths, weaknesses, challenges, features, etc. for SCOPE 3, I would like to hear your comments.
- A6. The area of SCOPE 3 brings very difficult challenges. SCOPE 3 is an area where people from various industries are involved, and their ideas and activity policies vary. There are many things that are different across countries, and there are many areas that we cannot tackle with our own way of thinking.

To achieve carbon neutrality, we must cover and combine all technologies in various processes and fields

Fortunately, Aisin is involved in a wide variety of products, in addition to general materials and casting and forging materials. Thanks to this, we possess a large number of elemental technologies, and we are working on the development of environmental technologies by combining these various technologies and systematizing them.

Regarding efforts for SCOPE 3, we would like to make solid achievements in the areas of SCOPE 1 and 2 first and present successful cases to the area of SCOPE 3. In addition, we are currently making efforts for SCOPE 3 together with activities that will help related companies understand Aisin's approach.

In any case, policies differ among countries or regions, so we have just started to work on reducing carbon emissions in SCOPE 3 while providing technologies that match each country or region.

- Q7. Regarding the environmental investment for realization of a carbon-neutral society, you explained the investment amount of 110 billion yen in production and 270 billion yen in products.
 - Please tell us how and where this investment will be allocated, such as capital investment, R&D investment, or expenses. If it is a capital investment, I would like to know whether this investment will be added to the current level, whether it is to replace some subjects of the investment, or whether it will be generated by improving efficiency.
- A7. This environmental investment is basically equivalent to capital investment. Regarding whether this investment will simply be added, one premise is that conventional investment will shrink. In addition, from the viewpoint of carbon neutrality, we are thinking of diverting the current equipment, for example, in the 1/2 production line as explained. And, we are sure that the

investment of 110 billion yen on the production aspect includes a reduction effect until 2025.

Therefore, from a financial point of view, while we currently hold fixed assets of 1.5 trillion yen, we are gradually working on carbon neutrality and electrification for the time being. Even if they are added, we are assuming that we will keep the investment at the level of 200 billion yen to 250 billion yen a year.

I would like to give you a little additional explanation on high efficiency and miniaturization of electrified units in terms of products and various equipment used in production. In parallel with advancing environmental technologies, we have been performing activities to reduce heat sources, energy sources, and power sources. As a result, production processes of various products have become considerably shorter. Therefore, the amount of investment required for new equipment is very small, and most of the existing equipment can be utilized. We will not increase the conventional investment amount, rather we can reduce it in some areas, so it can be said that the total amount including for the addition of new technology will not increase so much.

- Q8. Regarding eAxle, the launches of the second and third generations are in 2025 and 2027, respectively, and the interval is only two years. Is the third generation an extension of the second generation? Also, is expanding sales of electrified units to European OEMs that have transactions of A/T a target of the third generation?
 - In addition, there was an explanation of alliances with external bodies. Please tell us whether it means that cooperation with external bodies that complement in the technological aspect is necessary.
- A8. Regarding the continuity from the second generation to the third generation, of course, they are connected in terms of the concept of high efficiency and miniaturization. However, you can say that the technologies to be introduced have a considerable technical step from the second generation to the third generation.
 - Also, regarding whether we are targeting European OEMs with the third generation, that is not our intention. Aisin considers the second generation to be the most important, and we will put our efforts into creating a full lineup of products, including small, medium, and large. And we would like to connect it to the third generation and beyond.
 - Finally, concerning alliances, I would like you to see them in a broad sense. For example, the third generation will be advanced development for Aisin. If there is a lack of technologies in advancing development, we will work together with suppliers and external research institutes. You can view alliances as such cooperative relationships or joint development.
 - I hope you will understand that Aisin aims for growth like hop, step, and jump, from the first generation to the second and third generations.
- Q9. Please comment on whether there is a chance of succeeding against emerging players at

present and how you are analyzing your competitors.

- A9. I will not comment on other companies, but Aisin wants to be more competitive and selected by many OEMs. Putting 200 persons onto the third generation project and introducing resources of other companies into the development of various new technologies will enable us to make more competitive products gradually for the first, second, and third generations. So please look forward to it.
- Q10. Regarding the investment competitiveness, I think that eAxle and HEV are included in the 4.5 million units in 2025, and I would like to have an explanation on the basic unit that is the basis of this logic for 4.5 million units, 270 billion yen.
- A10. The investment amount presented this time is not limited to 4.5 million electrified units. All investments related to brakes, electrified devices, cooling systems, etc. are included as strategic investments until 2025. However, regarding the basic unit, it includes confidential information, so I am not able to talk about it in detail, but presumably, when HEV is compared with A/T, the number of parts used in HEV should be smaller, so the investment will decrease to some extent. When HEV is compared with eAxle, the number of parts used in eAxle will further decrease, so it can be said that the investment will also go down. I hope you will understand that we can achieve the same capability using low-cost lines without making a large investment. We would like to overcome cost competition through these efforts.
- Q11. When conventional parts are replaced with eAxle, some products, such as inverters, will be supplied by other companies and the added value will decrease as the marginal profit decreases, I think. But can the total bottom line margin be maintained due to the decrease in capital investment?
- A11. We would like to reach a close line. As the total sales will decrease, the profit amount may decrease. But, we would like to bring the profit margin to the same level.
- Q12. Do I understand correctly that you want to make up the total by adding other electrified products?

A12. Yes, your understanding is correct.