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<th>Entrepreneurial Leadership and Financial Strategy of Tonen Corporation within the Global Strategy of Exxon and Mobil, c.1970-c.1990</th>
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Abstract

Through examining the corporate financing strategies of Tonen Corporation (Tonen; now TonenGeneral Sekiyu), Exxon and Mobil’s (now ExxonMobil) affiliated company in Japan, the main purpose of this report is to shed light on the entrepreneurial leadership and growth of this local subsidiary under the global strategy of its parent company.

In numerous previous studies focusing on the so-called “the Majors”, the major international oil companies, as a typical examples of multinational corporation, it has been pointed out that they expanded their regional activities through the use of subsidiaries during the process of becoming multinational. However, it has been less explored the aspect of local subsidiaries’ activities and influence by the local management groups and their abilities for their corporate growth. Using Tonen as its case, this study reveals the characteristics of the growth process attributable to the local affiliate, and the leadership of the management teams particularly during periods of the tension between global strategy of parents company and local affiliate’s own corporate strategy.
Introduction

In what cases does friction arise between multinational corporations which globally expand their business and their local subsidiaries? This report discusses the developmental process of friction by taking up the case of a major international oil company and its Japanese subsidiary and observing the independent administrative behavior of the local management.

Among previous historical studies, some are left which focused on the growth of major international oil companies (Chandler, 1962; Penrose, 1968). For one thing, this may be because major international oil companies are typical examples of multinational corporations. Some multinational corporation studies point out that the characteristics of multinationalization of major international oil companies lie in their expansion of spheres of activities by utilizing the form of subsidiaries in the process (Vernon, 1971). This indication by R. Vernon can be said to indirectly suggest that independent administrative behavior is brought to local subsidiaries. Generally, it is assumed that some form of friction against parent companies is generated when local subsidiaries take strong positions to adhere to independence.

Through examining the case of Exxon Corporation (hereinafter, Exxon), Mobil Corporation (hereinafter, Mobil) and Tonen Corporation (hereinafter, Tonen) which used to be their local subsidiary and observing the behavior of Nobuyuki NAKAHARA, the local management who embodied the independence as mentioned above, this report discusses the process of how friction arose between them.

2. Light and Shadow

In this section, it provides the summary of the capital and business alliance among Exxon, Mobile and Tonen as well as the business performance of Tonen.

As indicated in Chart 1, the companies which actually possessed the shares of Tonen were Esso Eastern Incorporated (hereinafter, Esso Eastern) and Mobil Petroleum Company Incorporated (hereinafter, Mobil Petroleum), and their ratios of capital contribution to Tonen were 25% respectively. Their business tie-up relationships were as follows: Tonen procured crude oil from Esso Eastern and Mobil Petroleum and refined. After that, all products of Tonen were sold to Esso Sekiyu K.K. (the Japanese subsidiary of Esso Eastern) and Mobil Sekiyu K.K. (the Japanese subsidiary of Mobil Petroleum).

Exxon Mobil

Esso Eastern

(100%)

Esso Sekiyu (Japanese subsidiary)

Product Sales

Crude Oil Supply (25%)

Tonen Refinement

Product Purchase

Japanese Market

Mobil Petroleum

Mobil Sekiyu (Japanese subsidiary)

Product Sales

Crude Oil Supply (25%)

Japanese Market

Source: Created by the author based on the Yukashoken Hokokusho [Annual Securities Report], various years.

Note: The numbers of % inside parentheses indicate ratio of capital contribution.

Chart 2 indicates shifts in Return on Assets (ROA) of Japanese major oil companies. It clarifies that the values of Tonen have been shifting at the highest level among the four companies after reaching the highest value in 1986. In the quarter ending December 1986, Tonen declared the highest ordinary profit in the postwar period of JPY 91.4 billion. This amount was exceptional among Japanese oil corporations. In addition, in fiscal 1986 (the term from April 1986 to March 1987), Tonen was ranked as the 11th among all listed companies with its ordinary profit far larger than Hitachi, Ltd. and Honda Motor Co., Ltd. Behind such a high profit, there existed the strengthened financial structure after the first oil crisis. It was Nobuyuki Nakahara appointed as the financial director in 1970 who was greatly involved in the measures to strengthen this financial structure.⁵

Source: Created by the author based on the *Yukashoken Hokokusho*, various years.

Nobuyuki Nakahara was born in 1934 as the first son of Nobuhei Nakahara who is considered as the “substantial founder” of Tonen. He entered the University of Tokyo in 1953, graduated from it in 1957, and then, studied economics at the Graduate School of Harvard University for two years. After finishing the graduate school, he entered Tonen in 1959 following the advice of his father. After entering Tonen, he experienced some staff sections, joined the Auditors Room at his own request, and started to serve as the permanent auditor in 1966. The reason why he chose to become an auditor by himself which was considered as a sinecure in Japan is because he was able to extract and analyze problems of Tonen by joining the Auditors Room where all in-house information including that on accounting and finance gathered. It is assumed that Nakahara may have started to envisage the ideal future situation of Tonen during his auditor period while understanding the actual managing conditions of Tonen with such problem awareness. After the position, he was appointed as the accounting/financial director in 1970 and the executive managing director in 1974. One of the former executive at Tonen, who played a central role in implementing financial policy, talked about Nakahara of that time: “Mr. Nakahara himself thought he would become the president in the future. But back
then, it was not possible for him to automatically become the successor of Nobuhei as it would have at Idemitsu [a major Japanese family-owned oil company fully based on Japanese capital]. For him to climb to the top, he had to pass Exxon and Mobile, the major shareholders. [...] Although there was a tacit understanding that he was the person to become the future president in the company, this was not wide agreement. Mr. Nakahara was making enormous efforts which could be more than necessary in order to surpass his father.º Nakahara built up his achievements as the accounting/finance officer for 14 years and became the executive vice-president in 1984, and finally, the president of the company in 1986.

A former top executive at Tonen cited the series of measures to strengthen the company’s financial structure Nakahara had conducted after the first oil crisis as a reason why he had been able to become the president.º It can be said that Nakahara’s financial measures implemented in rapid succession served as a preparatory step to have Exxon and Mobile, the major shareholders, recognize him as “someone appropriate as the top executive.” However, in March 1994, eight years after Nakahara had assumed the presidency, Exxon and Mobile virtually dismissed him. A newspaper article at that time reported the reason of his dismissal as follows: “Many believe that he clashed with American major Exxon and Mobile, the large shareholders, over the dividend policy and ‘was dismissed’ as a matter of fact.”º If the content of this article is true, it is inferred that Tonen had been in some sort of conflict against Exxon and Mobil over distribution of profit.

3. Why Was the Light Shining?

In the wake of the first oil crisis, Tonen canceled all expansion plans for the oil refining facilities which had been in progress. In addition, it set up strict management policies such as restriction of capital investment within the scope of depreciation.º The policies also included promotion of proactive financial and accounting measures.

After 1974, the oil industry in Japan was exposed to an unprecedented severe environment. The oil price inflated due to the outbreak of oil crises in 1973 and 1978 and the yen exchange rate was suffering violent fluctuations caused by the irruption of the floating rate system in 1973. Furthermore, a money interest rate had been shifting at high levels in international financial markets since 1973. Many Japanese oil companies borrowed dollars from domestic banks and paid for crude oil import bills. Therefore, due to the escalating price of crude oil, they ended up with large amounts of debts in dollars while their interest expense increased. Moreover, the fluctuations of exchange rates also largely affected their business performance.

In order to deal with various problems caused by the abovementioned environmental changes, Nobuyuki Nakahara implemented mainly two measures. First, he changed the
evaluation method of stock to last-in first-out method (hereinafter, abbreviated as “LIFO”). He implemented this change in order to utilize the high crude oil price attributable to the first oil crisis occurred in 1973 to improve cash flow. The second is the reduction of the dollar-based short-term debt (hereinafter, “dollar loans”). This reduction worked exceedingly well for decreasing exchange risk resulting from the introduction of the floating rate system in 1973 and mitigating interest burdens which had rapidly increased due to the outbreak of oil crises in 1973 and 1978. In the following section, it describes the outlines of these two measures.

(1) Adoption of LIFO

In general, oil companies were prone to high costs, based on such cost structures where costs occupied more than 80% of sales amounts at the stage of sales costs. In this connection, the average sales cost ratio of seven major listed companies in 1979 was 85%.

In addition, the soaring crude oil price resulting from the first oil crisis increased this ratio up to 93% in 1974. This increase was due to the fact that purchasing expenses of crude oil accounted for the majority of sales costs. Considering such a situation, it indicates the critical influence of valuation of crude oil pricing over business performance.

Nakahara determined to adopt LIFO right after the onset of the first oil crisis. However, things didn’t develop easily. As is suggested by the repeated negotiations for LIFO adoption between employees of Tonen and the taxation bureau, the bureau initially expressed disapproval for Tonen to adopt LIFO. Behind this background, the bureau was concerned about a sharp decline in tax revenues caused by reduction of Tonen’s profits following the LIFO adoption. After all, as a result of repeated negotiations with the taxation bureau, Tonen adopted LIFO in a stepwise fashion, taking three years starting in 1974. Thus, although Nakahara’s insistence was finally accepted, the path to Tonen’s adoption of LIFO was never smooth. To put it the other way around, this means that Nakahara strongly aspired for the adoption of LIFO.

However, why did Nakahara stick to the adoption of LIFO this much? The *Tonen Goiijunen Shi [A History of Fifty Years of Tonen Corporation]* explains the reason of the adoption as “restoration of asset components.” However, in reality, it was because the adoption would serve as a cash outflow restraint measure utilizing profit-reduction effects. As I mentioned before, it is assumed that a series of capital investment policies were, for one thing, to stabilize cash flow. Nakahara’s adoption of LIFO can be seen as an extension of such policies because its main point was placed in the improvement of cash flow.
(2) Reduction of Dollar Loans

The balance of dollar loans of Tonen was less than $200 million at the end of 1973, but exceeded $500 million at the end of fiscal 1974 due to the escalating price of crude oil resulting from the onset of the first oil crisis. Moreover, rising interest rates in international financial markets in 1974 rapidly increased the interest expense of these dollar loans from approximately JPY 2,700 million in 1973 to approximately JPY 15 billion in the following year of 1974, yielding an approximately five-time increase within one year. As a countermeasure against such a rapid rise in the balance of dollar loans and a substantial increase of interest expense, Nobuyuki Nakahara applied excess funds as much as possible to reduce the balance of the dollar loans. Consequently, the balance of the dollar loans was reduced to approximately $390 million in 1976 and approximately $280 million in 1977. However, dollar loans increased once again because of the second oil crisis occurred in 1978. The financial condition of Tonen in 1981 was extremely difficult as was expressed by the remark, “it was the toughest time financially.” The increase of fund demand attributable to the second oil crisis was even harder than the first crisis.

Chart 3. Tonen’s Short- and Long-Term Debt and Interest expense—1973-1993
(JPY in 100 millions)

Source: Created by the author based on the Yukashoken Hokokush, various years and Tonen Gojyunen Shi, pp. 988-989 (Tonen Corporation, 1991)
Confronting such severe deterioration of the financial condition, Nakahara focused on the securement of liquidity of cash reserves and requested the line banks to fully utilize yen shift (replacement of dollar usance by moneylending for acceptance of import supplies) starting in 1981. Yen shift means to borrow long-term operating funds from banks and pay back dollar loans with the funds. By fully utilizing this yen shift, the borrowing periods of dollar loans shortened from 60 to 45 days in September 1982, then, to less than 30 days in 1986. Starting in 1982, this measure once again reduced the total amount of short-term debt, most of which were dollar loans, and the proportion of short-term debt in the total loans became almost the same as that of long-term debt in 1985. In the following year of 1986, the long-term debt exceeded the short-term debt (cf. Chart 3).


(JPY in 100 millions)

<table>
<thead>
<tr>
<th>Fiscal Year</th>
<th>Item</th>
<th>Exchange Rate</th>
<th>Ordinary Profit (before exchange gains and losses)</th>
<th>Exchange Gains and Losses (A)</th>
<th>Ordinary Profit (after exchange gains and losses) (B)</th>
<th>Ratio of (A) to (B)</th>
<th>Ordinary Profit (before exchange gains and losses)</th>
<th>Exchange Gains and Losses (A)</th>
<th>Ordinary Profit (after exchange gains and losses) (B)</th>
<th>Ratio of (A) to (B)</th>
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<tbody>
<tr>
<td>1973</td>
<td>279</td>
<td>721</td>
<td>45</td>
<td>766</td>
<td>5.9%</td>
<td>110</td>
<td>17</td>
<td>127</td>
<td>13.7%</td>
<td>110</td>
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<tr>
<td>1974</td>
<td>292</td>
<td>398</td>
<td>-520</td>
<td>-918</td>
<td>56.6%</td>
<td>185</td>
<td>-91</td>
<td>94</td>
<td>-97.0%</td>
<td>185</td>
</tr>
<tr>
<td>1975</td>
<td>299</td>
<td>-936</td>
<td>-192</td>
<td>-1,128</td>
<td>17.0%</td>
<td>113</td>
<td>-17</td>
<td>96</td>
<td>-17.8%</td>
<td>113</td>
</tr>
<tr>
<td>1976</td>
<td>293</td>
<td>1,122</td>
<td>1,050</td>
<td>2,172</td>
<td>48.3%</td>
<td>257</td>
<td>63</td>
<td>320</td>
<td>19.7%</td>
<td>257</td>
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<tr>
<td>1977</td>
<td>258</td>
<td>-321</td>
<td>3,077</td>
<td>2,756</td>
<td>111.6%</td>
<td>302</td>
<td>145</td>
<td>447</td>
<td>32.4%</td>
<td>302</td>
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<tr>
<td>1978</td>
<td>202</td>
<td>-1,844</td>
<td>2,383</td>
<td>539</td>
<td>442.1%</td>
<td>165</td>
<td>157</td>
<td>322</td>
<td>48.8%</td>
<td>165</td>
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<tr>
<td>1979</td>
<td>231</td>
<td>6,865</td>
<td>-4,013</td>
<td>2,852</td>
<td>-140.7%</td>
<td>303</td>
<td>-171</td>
<td>132</td>
<td>-129.5%</td>
<td>303</td>
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<tr>
<td>1980</td>
<td>218</td>
<td>-792</td>
<td>5,736</td>
<td>4,944</td>
<td>116.0%</td>
<td>397</td>
<td>238</td>
<td>635</td>
<td>37.5%</td>
<td>397</td>
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<tr>
<td>1981</td>
<td>226</td>
<td>543</td>
<td>-3,881</td>
<td>-3,338</td>
<td>116.3%</td>
<td>418</td>
<td>-105</td>
<td>313</td>
<td>-33.5%</td>
<td>418</td>
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<tr>
<td>1982</td>
<td>250</td>
<td>1,958</td>
<td>-45</td>
<td>1,893</td>
<td>-3.4%</td>
<td>394</td>
<td>-69</td>
<td>525</td>
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<tr>
<td>1983</td>
<td>236</td>
<td>1,164</td>
<td>1,185</td>
<td>2,349</td>
<td>50.4%</td>
<td>797</td>
<td>94</td>
<td>891</td>
<td>10.5%</td>
<td>797</td>
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<tr>
<td>1984</td>
<td>243</td>
<td>1,467</td>
<td>-617</td>
<td>850</td>
<td>-72.6%</td>
<td>699</td>
<td>-9</td>
<td>690</td>
<td>-1.3%</td>
<td>699</td>
</tr>
<tr>
<td>1985</td>
<td>223</td>
<td>-2,250</td>
<td>3,105</td>
<td>855</td>
<td>363.2%</td>
<td>461</td>
<td>104</td>
<td>565</td>
<td>18.4%</td>
<td>461</td>
</tr>
<tr>
<td>1986</td>
<td>161</td>
<td>1,827</td>
<td>780</td>
<td>2,607</td>
<td>29.9%</td>
<td>769</td>
<td>145</td>
<td>914</td>
<td>15.9%</td>
<td>769</td>
</tr>
<tr>
<td>1987</td>
<td>139</td>
<td>2,099</td>
<td>678</td>
<td>2,777</td>
<td>24.4%</td>
<td>430</td>
<td>97</td>
<td>527</td>
<td>18.4%</td>
<td>430</td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td></td>
<td></td>
<td>11,225</td>
<td>43.8%</td>
<td>5,800</td>
<td>998</td>
<td>6,398</td>
<td>9.3%</td>
<td>5,800</td>
</tr>
</tbody>
</table>

Source: The oil industry section prepared by the author based on informative materials from Mr. Toru NAKATA at the public relations office, Petroleum Association of Japan; the exchange rate based on Keizai Yoran, p.32 (Research Bureau, Economic Planning Agency, 1998); the section for Tonen based on the Yukashoken Hokokusho, various years and Tonen Gojyunen Shi, pp. 992-993 (Tonen Corporation, 1991)
Through the use of charts, it demonstrates the influence of reduction of dollar loans over ordinary profits.

First, Chart 4 is a comparison between the whole oil industry and Tonen of the influence of exchange gains and losses over ordinary profits after the introduction of the floating rate system in 1973. What it observes in the shift of the oil industry’s ratios of exchange gains and losses to ordinary profits is the high proportion of the exchange gains and losses in the ordinary profits. The values indicate double digits in all years except 1973 and 1982, sometimes exceeding 100%. This reveals how much influence exchange gains and losses had over the business performance of the oil companies. On the other hand, the above ratios of Tonen can be said to be lower than that of the whole industry by and large. Especially, this tendency is remarkable in years after 1976 except 1982. This suggests that the reduction of dollar loans led to decrease of exchange risk.

Chart 5. Shifts of Tonen’s Interest Expense and Interest Rates—1973-1993

(JPY in 100 millions)

Source: The same as Chart 3.

Note: Interest rate = current interest expense / [(interest - bearing debt at the end of the former term + interest - bearing debt at the end of the current term) / 2]
Next, as a matter of course, because the fluctuation of interest expense accompanies the increase and decrease of loans, interest expense diminished proportionally to the reduction of all loans (cf. Chart 3). However, the most notable point is that interest burdens were largely reduced by the start of full utilization of yen shift in 1981. As in Chart 5, the loan interest rate in 1981 indicated the highest value in Chart thereof. This is due to a precipitous rise of the interest rate in the BA\(^1\) market (90 days) in the U.S. starting in 1979, from where Tonen got the majority of their funding in dollars. In this connection, BA’s interest rate was 10.9% in 1979 but it reached as high as 15.3% in 1981. Even after that, the short-term interest rate tended to remain at high levels.\(^2\) On contrary, the long-term interest rate in Japan in 1981 was approximately 6% lower.\(^2\)

In this section, it demonstrates that the measures to strengthen financial aspects largely contributed to the improvement of ordinary profit. And it provides the reason why Tonen’s ROA (Return on Assets) in Chart 2 remained at a higher level than those of other major oil companies although sometimes showing some fluctuations. This reduction in dollar loans was the embodiment of Nakahara’s policy that “the key to better profitability of a corporation lies in breaking down the biggest cost item.”\(^2\) In addition, it also means that this embodiment was supported by the development of proactive and sound financial measures to thoroughly preclude external influence which would distort important accounting information serving as guidelines for management judgment.

4. Why Was the Light Lost?

In the previous section, it was indicated that the accounting/financial measures of Nobuyuki Nakahara contributed to the improvement of cash flow and ordinary profit. However, ironically, Nakahara was virtually dismissed from the presidency by Exxon and Mobile. This section discusses the course of development of the strained relationship between concerned parties by observing what kind of decision-making was done after Nakahara became the president.

Chart 6 indicates the tendency of distribution of net profits during a period of approximately ten years before and after 1986 when Nakahara became the president. This Chart shows that during the period from 1976 to 1987, the priority was placed not on dividends but on internal reserves. Then, what were these accumulated profits used for?

In the 1985 corporate plan (medium-term management plan), Nakahara proposed to set up the following four major fields as new businesses:\(^2\) The first was the field of new materials (high-performance carbon fiber, etc.); the second was the field of new energy conversion, or specifically, research on solar power generation and fuel cells; the third was biotechnology research; and the fourth was the field of information science. For their research, a research
building and an experimental laboratory were built in 1988 and the number of researchers was also largely increased. Subsequently, the worksite cafeteria and bachelors' dormitories for the researchers were completed in 1990. It is impossible to clarify the details of the investment amount because the individual amounts were not disclosed. However, according to the estimation based on financial statements, the investment amount for the new businesses was assumed to have been quite enormous.


Source: Created by the author based on Yukashoken Hokokusho, various years.
Note: Dividend ratio = dividends / current net income

On the other hand, the reactions of Exxon and Mobil for the launch of these new businesses were “extremely cautious about the advancement into new businesses with high risks.”24 The reason for this reaction of Exxon was because “around 1980, Exxon diversified in the fields of office computers, carbon fiber and solar cells but then withdrew from them one by one under the policy of ‘BACK TO BASICS’ to specialize in petroleum and petrochemistry.”25 The cautiousness of Exxon is confirmed by the fact that from 1988 it appointed L. K. Strohl as the director of Tonen, a figure who was directly involved in Exxon ’s withdrawal from new businesses.26

According to the above, the fields of new materials and new energy conversion which Nakahara promoted overlapped the areas from which Exxon withdrew. In other words, it can be
said that Nakahara’s strategy of new businesses included the elements running counter to the strategy of the parent corporation. After all, commercialized solar cells and carbon fiber couldn’t expand the sales share and all commercialization technologies of those products were sold after the dismissal of Nakahara from his presidency.

However, what is noteworthy here is that Chart 6 indicates the dividend ratio almost reaching 100% starting in 1988, and moreover, it shows dividend distribution implemented at the sacrifice of reduction of undivided profits in 1992 and 1993. The shift of the dividend ratio after 1988 indicated by the chart hereof is inconsistent with the description that “he clashed with American major Exxon and Mobile, the large shareholders, over the dividend policy’’ and in consequence, “‘was dismissed’ as a matter of fact.” Therefore, although based on a tentative assumption, it examines where the real intention of Exxon and Mobile existed in demanding high dividends.

The discussion by Jensen (1986) can be mentioned as a suggestive one for this kind of high dividend demand. He discussed that to have greater power or promote their positions, managers might run the risk of wasting internal funds by investing in low-return projects and this was an agency problem resulting from the conflicting interests between managers and shareholders and that in cases as such, one could cut the agency cost by higher dividend distribution.27 This agency cost refers to the expenses arising in relations between fund providers (clients) and managers (agents). In addition, the agency cost consists of monitoring cost to monitor managers, bonding cost to prevent managers from taking adverse actions to the interests of fund providers, and residual loss which cannot be compensated even by these two costs.28

By examining Exxon and Mobile’s demand for high dividends in the light of this discussion over the agency cost, it is inferable that the both companies demanded high dividends in an attempt to prevent internal funds from flowing to new businesses, and furthermore, that they tried to limit the discretion of Nakahara.

5. The Trap the Leader Got Caught in

Nakahara did not stop investing in new businesses despite several signals sent out by Exxon and Mobile such as appointment of L. K. Strohl and high dividend demand. In other words, already at the time of Nakahara’s assumption of the presidency, there existed a huge contradiction between the parties as pertains to the future direction of Tonen. It is assumable that this contradiction resulted from Nakahara’s “arrogance” as a manager and his “overconfidence” in his management ability, and his disposition as a manager as such eventually led to gradual formation of the conflict between the parties. According to this, the news report on the reason of his dismissal from the presidency as “a conflict over the dividend
policy” is more likely done out of consideration of Exxon and Mobile to Nakahara.

Before ending this report, as Nakahara’s disposition which disqualified him as a manager, I could point out Nakahara’s inability to foster mediators to restore his contradiction with Exxon and Mobile, or, if such mediators existed around him, his incapability to comply with their advice.

3 Exxon and Mobil merged and became current Exxon Mobil Corporation in November 1999.
6 Interview with former executive at Tonen (conducted on June 20, 2011).
7 Interview with former top executive at Tonen (conducted on October 31, 2006).
10 The average was calculated based on the Yukashoken Hokokusho of the seven major listed companies.
11 Interview with former executive at Tonen (conducted on May 31, 2007).
12 Tonen Gojyunen Shi, op. cit., 559.
13 Interview with former top executive at Tonen (conducted on October 31, 2006).
14 Tonen Gojyunen Shi, op. cit., 559.
15 Ibid.
16 Based on the Yukashoken Hokokusho, various years.
17 Tonen Gojyunen Shi, op. cit., 734.
18 Regarding this shortening of dollar usance periods, Mr. Jun Inoguchi, the financial director back then, commented in an interview as follows: “Currently [in 1986] many oil companies shortened these durations [dollar usance periods] to 60 days and Nisseki shortened them to 45 days. But Tonen’s durations became less than 30 days, almost reaching the limit.” (Kinyu Business May 1986: 60.)
19 BA is the abbreviation of Banker's Acceptance which is a usance bill drawn by importers and
exporters for trade settlement and accepted by banks.

20 http://www.econstats.com/r/rusa_aa15.htm

21 http://www.boj.or.jp/statistics/dl/loan/prime/primeold.htm/

22 Interview with former executive at Tonen (conducted on October 31, 2006).

23 Tonen was in a situation where its free cash flow accumulated year by year. Regarding the investment behavior of a corporate under such circumstances, it is pointed out that when an organization with substantial free cash has limited investment opportunities, it is most tempted for overinvestment. Jensen, M. C. “Agency Costs of Free Cash Flow, Corporate Finance and Takeovers.” American Economic Review. 76. 2 (1986): 323–339.


25 Interview with former executive at Tonen (conducted on November 20, 2010). He engaged in the development department for the new businesses.

26 Based on materials compiled from the interviews with concerned persons of Tonen.
