

## CORPORATE STRUCTURE AS A FACTOR IN CONSERVATION IN THE PETROLEUM INDUSTRY

Before the legal foundations underlying the problem of stabilization of the petroleum industry may be approached, a number of salient facts concerning the economic structure of that industry must be understood. If stabilization is to come at all, the first question which presents itself is, at what stage, from production to ultimate distribution, may control be exercised most effectively? The solution to this problem may be simplified greatly by a study of the internal structure of the petroleum industry. It is clear that if the industry presents a greater integration at one stage than at another, whether in production, or in transportation, or again in refining, or in marketing, such regulation could be exercised most effectively at that point within the process. Whether this regulation should come in the form of voluntary cooperation within the industry or externally by governmental control, and the legal implications of either method of control, are questions which are left for subsequent treatment.<sup>1</sup>

Certain outstanding facts in the historical development of the petroleum industry should be considered first. The birth of the modern petroleum industry in America dates from August 27, 1859, when Col. E. T. Drake brought in the first well in Pennsylvania. The Civil War did not check its growth, so that by 1870 there were two hundred and fifty refineries in operation from Louisville, Ky., to Portland, Me. In the meantime in 1865, John D. Rockefeller had begun to refine petroleum on a small scale. In 1870, a new era in the industry was initiated by the reorganization of the firm of Rockefeller, Andrews and Flagler into the Standard Oil Co. of Ohio with a capital stock of one million dollars. Although this company was engaged only in refining and marketing, it had a far reaching influence on all branches of the industry.<sup>2</sup>

From 1870 until 1911, the history of the petroleum industry was centered around the development of the Standard Oil Co. It maintained its dominating position from its beginning.<sup>3</sup> In 1906, the Standard concerns controlled most of the refining and distribution, especially of illuminating oil which was the

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<sup>1</sup> Fuchs, *Legal Technique and National Control of the Petroleum Industry* (1931) 16 ST. LOUIS L. REV. 189.

<sup>2</sup> Logan, *The Stabilization of the Petroleum Industry*, Bull. 54, OKLA. GEOL. SURV. (1930) 12.

<sup>3</sup> *Ibid.* pp. 13-14. See also *Report of Hepburn Investigating Committee*, New York (1879) 2605.

principal product of that period.<sup>4</sup> However, they did not have a monopoly of crude oil production either through ownership or through lease, or through other contractual control of producing areas. The Standard organization was the largest consumer of crude for refining purposes, and its pipelines which transported oil more cheaply than railroads were geographically so situated that producers were obliged to sell to Standard. Hence, without the actual ownership of the land and the highly incumbent speculative risk, it was able to control the price of crude oil. Besides the companies which the Standard Oil Co. actually owned,<sup>5</sup> there were a number of other companies which were so closely associated by contract and otherwise as to be in a large measure controlled by it.<sup>6</sup>

The dissolution in 1892<sup>7</sup> of the original trust agreement of the Standard Oil Co. which had been formed in 1882, was of little effect in destroying the monopoly, since after the reorganization, the control of the company still lay in the hands of a few individuals.<sup>8</sup> The Standard of New Jersey had replaced the Standard of Ohio as the central corporation. In 1911, the Supreme

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<sup>4</sup> *Report of the Commissioner of Corporations in the Petroleum Industry*, REP. BUREAU OF CORP. (1907) Part I, pp. 13-18. The report of the Bureau of Corporations found that in 1906, the Standard Oil Co. had 84.2 per cent of the crude consumption of the country. In output of refined products, Standard concerns proper, then produced 78.7 per cent of the total for the country while 7.8 per cent more was produced by closely affiliated concerns, giving a total of 86.5 per cent. The principal product of that period was illuminating oil and the Standard is estimated to have had 87 per cent of the total exports and 88.7 per cent of the domestic marketing of this product.

<sup>5</sup> In 1906, the Standard Oil Co. of New Jersey controlled through stock ownership, 10 refining companies, 4 lubricating oil and compound companies, 12 pipe line companies, 1 tank car company, 6 marketing companies, and 16 natural gas companies in active operation in the United States, and 15 companies in active operation in foreign countries.

<sup>6</sup> Federal Trade Commission, *Petroleum Industry—Prices, Profits and Competition*. SEN. DOC. 61, 70th Cong. 1st Sess. (1928) pp. 64-65.

<sup>7</sup> *State v. Standard Oil Co.* (1892) 49 Ohio 137, 30 N. E. 279. See Dana, "Monopoly" Under the National Anti-Trust Act (1894) 7 HARV. L. REV. l. c. 348. The arrangement was dissolved because the court held it to be an *ultra vires* act as tending to create a monopoly to control prices as well as production. The acts were held to be contrary to public policy and therefore illegal.

<sup>8</sup> *Report of the Commissioners on the Petroleum Industry*, *op. cit.* Part I, pp. 79-82. In 1899 the stock of the Standard Oil Co. of New Jersey was increased for the purpose of taking over as a holding company, the control of the companies that had been in the trust, some twenty in number. As a matter of fact, John D. Rockefeller and Henry M. Flagler had virtual control of, or at least the former, by combining with Flagler or with any one of several combinations of other stockholders, could control a majority of the voting stock. Yet, this would have made no difference, since the per-

Court affirmed<sup>9</sup> the decision of the U. S. Circuit Court in Missouri in finding that the Standard Oil Co. had formed "a combination or conspiracy in restraint of trade and commerce in the various States, Territories, and with other nations." As a result, the Standard Oil Co. of New Jersey distributed the stocks of its 33 principal subsidiaries to its stockholders in accordance with the permission given it by the decree. Although the old Standard passed out of the picture, it influenced indirectly the subsequent history, especially since the new Standard Companies still have a considerable control over the petroleum field.

Following the dissolution decree, the Standard group was still under the control of the stockholders of the former Standard, but not as a single unit controlled by a holding company. The change of ownership, however, in a single company to holdings of stock in many companies with differing possibilities and earning powers was certain in time to disperse this control.<sup>10</sup> The history of these various Standard groups after the dissolution, therefore, has conformed more or less to the general trends affecting the industry as a whole. Many of the large independent companies have developed into corporations of considerable size, and are larger today than some of the larger companies in the Standard group. The accompanying table indicates the comparative strength of the Standard companies in the industry. (See Figure I)<sup>11</sup>

Reference to the table will show that five large independent companies were formed after the dissolution decree of 1911, and that the investment of each of the other five increased from about

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sonalities of the several large holders insured their complete domination of the organization. See p. 65 of Senate Document 61, 70th Congress, above, for a table showing a comparison of large holdings of certificates of the trust of 1882 with large holdings of stock of the Standard Oil Co. of New Jersey of 1899, giving the names of the various holders.

<sup>9</sup> Standard Oil Co. v. U. S. (1911) 221 U. S. 1.

<sup>10</sup> Pogue, *ECONOMICS OF PETROLEUM* (1921). Of the thirty-three companies, eleven were marketing concerns, and after the dissolution, these companies continued to do business in their respective territories. The decree has been criticized by many lawyers and economists, especially the latter, who are ready to point out that the factor which had worked to exert national rather than sectional influence upon the trend of markets and to establish a general level of petroleum prices, subject only to transportation and similar normal variations, had been wiped out of existence. However, the admitted efficiency which characterized the original corporation was not quite removed by the dissolution decree and is still in evidence in the detached organization. Whether the gross result of the efficiency as a whole has been seriously lost, so as to have injured substantially the economic prosperity of the country, is another question.

<sup>11</sup> Federal Trade Commission, *Petroleum Industry—Prices, Profits and Competition*, *op. cit.* n. 6 above, 61.

FIGURE I.

Investment (capital stock, bonds, serial notes, and surplus) of 20 petroleum companies having an investment of \$100,000,000 or over in 1926, for 1911, 1925 and 1926.

Company	1911	1925	1926
Standard Oil Co. (New Jersey)...	<sup>1</sup> \$292,000,000	\$1,063,903,806	\$1,264,161,247
Standard Oil Co. of New York...	75,955,736	480,445,402	629,072,475
Standard Oil Co. of California....	39,213,195	514,140,342	543,697,627
Standard Oil Co. (Indiana).....	<sup>2</sup> 25,217,405	368,383,842	402,835,977
Sinclair Consolidated Oil Corp...	<sup>3</sup>	328,428,185	336,308,361
The Texas Co.....	<sup>4</sup> 43,602,995	277,916,023	292,812,541
Empire Gas & Fuel Co. (Delaware)	<sup>3</sup>	<sup>5</sup> 254,036,792	<sup>6</sup> 284,914,914
Gulf Oil Corp. of Pennsylvania...	25,363,095	260,633,349	284,645,433
Shell Union Oil Corporation.....	<sup>3</sup>	243,583,000	253,666,793
Pan American Petroleum & Transport Co.....	<sup>8</sup>	169,957,530	234,233,941
Tide Water-Associated Oil Co....	70,660,742	208,068,159	215,567,834
Union Oil Co. of California. ....	71,032,422	150,306,327	183,940,657
Pure Oil Co.....	10,337,932	<sup>6</sup> 167,671,940	<sup>6</sup> 168,890,149
Humble Oil & Refining Co. <sup>7</sup> .....	<sup>3</sup>	119,577,597	160,161,367
Prairie Oil & Gas Co.....	<sup>8</sup> 53,915,176	139,435,262	150,962,163
Vacuum Oil Co.....	<sup>9</sup> 24,167,478	133,014,762	131,170,684
Atlantic Refining Co.....	<sup>10</sup> 15,965,748	121,688,578	121,274,910
Prairie Pipe Line Co.....	<sup>3</sup>	104,971,903	112,955,936
Phillips Petroleum Co.....	<sup>3</sup>	91,177,853	105,367,160
Ohio Oil Co.....	<sup>10</sup> 44,051,447	96,144,569	101,312,431
Total.....	\$791,483,371	\$5,293,485,221	\$5,977,952,600

<sup>1</sup> "High cost of gasoline and other petroleum products," p. 193, hearings before a subcommittee of the Committee on Manufactures, United States Senate, Sixty-seventh Congress, second and fourth sessions.

<sup>2</sup> *Ibid.*, p. 768.

<sup>3</sup> Not in business in 1911.

<sup>4</sup> June 30, 1911.

<sup>5</sup> Year ending November 30.

<sup>6</sup> Year ending March 31.

<sup>7</sup> Controlled by Standard Oil Co. (New Jersey).

<sup>8</sup> Includes investment in Prairie Pipe Line Co.

<sup>9</sup> Includes \$3,238,443 due Standard Oil Co. (New Jersey).

<sup>10</sup> Computed from statement for December 31, 1912.

200 to 7500 per cent. The Standard companies represent about sixty per cent of the investment of the twenty companies. Furthermore, while the distribution due to the decree resulted in a marked decrease in the Standard of New Jersey's investment, from the end of 1911 to 1926 it increased 333 per cent.<sup>12</sup> That the other important Standard companies increased tremendously

<sup>12</sup> Record in *U. S. v. Standard Oil Co. of New Jersey*, above, vol. 7, p. 32. On December 31, 1906, soon after the dissolution suit was brought, its investment was \$359,400,000, while on December 31, 1911, immediately after stock in most of the subsidiaries was distributed ratably to stockholders, it was only \$292,000,000.

FIGURE II.

Portions of large groups in the industry as measured by different standard, 1925.

Company	Proportion of Total United States							Proportion of Total in Table	
	Proven Acreage	Crude Produced	Crude Consumed	Gasoline Produced	Kerosene Produced	Fuel Oil Produced	Lubricating Oil Produced	"Oil Investment"	"Oil Earnings"
	Per Cent	Per Cent	Per Cent	Per Cent	Per Cent	Per Cent	Per Cent	Per Cent	Per Cent
<b>Standard Groups:</b>									
Standard Oil Co. (New Jersey) ..	2.5	5.3	15.9	14.3	21.0	14.4	20.6	17.7	14.4
Standard Oil Co. of New York ..	5.7	3.7	7.2	5.2	9.0	7.8	3.3	15.3	10.9
Standard Oil Co. (Indiana) .....	.8	2.7	6.9	10.8	10.6	2.7	9.4	8.1	14.7
Standard Oil Co. of California ..	2.1	7.2	8.6	4.6	6.3	11.5	5.0	9.6	11.4
Atlantic Refining Co. ....	.2	.4	3.1	2.9	4.5	2.1	7.6	3.0	2.1
Prairie Oil & Gas Co. ....	4.4	1.8	.5	.6	.2	1.6	....	4.2	3.8
Continental Oil Co. ....	3.9	.9	.5	.8	.4	.4	....	2.1	1.0
Vacuum Oil Co. ....	....	.1	.9	.5	1.2	.4	6.8	2.1	3.5
Ohio Oil Co. ....	10.7	2.0	....	....	....	....	....	1.7	2.2
South Penn Oil Co. ....	16.9	.3	....	....	....	....	....	1.5	.3
Standard Oil Co. (Ohio) .....	....	....	.9	1.4	1.4	.4	1.1	.9	.9
Standard Oil Co. (Kentucky) ..	....	....	.1	.3	....	....	....	.6	1.9
Galena Signal Oil Co. (Pennsylvania) .....	....	.1	.4	.4	.6	.4	1.4	.4	....
Standard Oil Co. (Kansas) .....	....	....	.5	.8	.7	.2	....	.2	.1
Solar Refining Co. ....	....	....	.3	.5	.1	.2	.3	.1	.1
Standard Oil Co. (Nebraska) ..	....	....	....	....	....	....	....	.1	.3
<b>Total Standard groups .....</b>	<b>47.4</b>	<b>24.5</b>	<b>45.8</b>	<b>43.1</b>	<b>56.0</b>	<b>42.1</b>	<b>55.5</b>	<b>67.6</b>	<b>67.6</b>
<b>Standard Associates:</b>									
Sinclair Consolidated Oil Corp. ..	1.3	1.4	3.5	5.0	2.9	2.8	3.4	7.0	2.8
Tidewater-Associated Oil. ....	10.2	3.4	4.4	3.4	2.1	5.8	3.3	4.8	4.5
<b>Total Standard Associates ..</b>	<b>11.5</b>	<b>4.8</b>	<b>7.9</b>	<b>8.4</b>	<b>5.0</b>	<b>8.6</b>	<b>6.7</b>	<b>11.8</b>	<b>7.3</b>
<b>Total, both groups .....</b>	<b>58.9</b>	<b>29.3</b>	<b>53.7</b>	<b>51.5</b>	<b>61.0</b>	<b>50.7</b>	<b>62.2</b>	<b>79.4</b>	<b>74.9</b>
<b>Other Large Groups:</b>									
The Texas Co. ....	1.1	2.8	4.7	5.9	4.7	3.0	4.4	7.4	10.7
Gulf Oil Corporation .....	5.0	4.8	4.9	4.8	4.4	4.2	6.9	6.3	9.5
Shell-Union Oil Corporation ..	1.5	6.3	4.9	4.4	4.3	5.9	1.7	6.9	4.9
<b>Total other large groups ....</b>	<b>7.6</b>	<b>13.9</b>	<b>14.5</b>	<b>15.1</b>	<b>13.4</b>	<b>13.1</b>	<b>13.0</b>	<b>20.6</b>	<b>25.1</b>
<b>Total Standard and other groups reporting .....</b>	<b>66.5</b>	<b>43.2</b>	<b>68.2</b>	<b>66.6</b>	<b>74.4</b>	<b>63.8</b>	<b>75.2</b>	<b>100.0</b>	<b>100.0</b>

during the same period should be noted.<sup>13</sup> The second table (Figure II) shows the comparative positions of the Standard companies in relation to the whole industry and to the independent companies.<sup>14</sup>

The purpose of this table is two-fold. First, it calls attention to the substantial decrease that has taken place in the proportion of control of certain branches of the industry by the Standard companies in the aggregate, and secondly, it shows the extent to which there is still control over the industry by a few large groups. It should be noted that the Standard groups combined with their associates control only 29 per cent of the crude production and roughly one-half of the refined products. In 1904, the companies under the complete control of the Standard of New Jersey produced nearly 80 per cent of all the refined products. Also, at the time of the compilation of this table, the most important single company in the industry except for crude petroleum produced and proven acreage controlled was the Standard of New Jersey. The largest companies as listed in the table have a combined output of between 65 and 75 per cent of all refined products. While there has been a marked dispersion of control of the refining industry in the last two decades, there has been equally as strong a tendency toward concentration in control of natural resources. In contrast to the policy of the old Standard Company, the new Standard groups are now among the largest holders of proven acreage, their combined holdings at the end of 1925 being 47 per cent of the total of such acreage and practically the same as their combined proportion of refined products. While this acreage is not all in rich producing areas, consolidations since the end of 1925 have brought under the control of particular Standard groups other areas that would substantially raise the average quality of the holdings.

At this point, it would be appropriate to outline in a general way the structure of the petroleum industry as a whole. The oil industry is divided into four divisions: production, transportation, refining and marketing. Most of the larger companies are complete in the sense that they perform all four functions. So much capital is required in the transportation and refining business that only a few companies, compared to the number in the

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<sup>13</sup> The Standard Oil Companies of New York, California and Indiana showed marked increases during the same period, 728, 1287 and 1407 per cent, respectively. This was due mainly to mergers and acquisitions. Also, it should be noted that the Prairie Pipe Line Co., the only pipe line company in the country with an investment in excess of \$100,000,000, increased 390 per cent.

<sup>14</sup> Federal Trade Commission, *Petroleum Industry—Prices, Profits and Competition*, *op. cit.* n. 6 above, 77.

other divisions, are engaged in these. Most of the oil is produced, transported, refined, and marketed by complete organizations each of which is divided into subsidiaries which confine themselves to only one branch of the industry.

According to estimates made by the *Oil and Gas Journal*,<sup>15</sup> there were invested in the petroleum industry in the United States in 1927 about \$11,300,000,000. This sum was divided among the four branches as follows: production, \$5,000,000,000; transportation, \$1,800,000,000; marketing, \$1,500,000,000; refining, \$3,000,000,000. In the transportation division \$900,000,000 are invested in pipelines, \$300,000,000 in tank cars and \$600,000,000 in tank steamers.

In regard to the internal mechanism of the corporate structure of the petroleum industry, an extensive survey by the Federal Trade Commission showed that the stock-holding was well diversified with comparatively very few large holders controlling much stock in several companies.<sup>16</sup> The number of directors in each company varies from only three for some of the smaller ones to approximately twenty-five for several of the larger ones. Although the survey showed some concentration<sup>17</sup> of directorates in the hands of a few persons, only four instances were found of an interlocking of directors such as would tend substantially to unify control of any large part of the petroleum industry, and none that would tend by this means to give control of the industry as a whole. While the attendance by stockholders at meetings of a company is usually small,<sup>18</sup> most of the im-

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<sup>15</sup> Anderson, *The Oil Industry's Answer Today*, OIL AND GAS J., Dec. 1, 1927, p. 113.

<sup>16</sup> Federal Trade Commission, *Petroleum Industry—Prices, Profits and Competition*, *op. cit.* n. 6 above, 79. Out of a total of 9560 holders, 163 held 1 per cent or more of the voting stock of each of two or more companies but had not more than one holding each as much as one per cent. None of the other 8,886 reported holders had stock in more than one company, and only 2,827 of them were holders of as much as one per cent of the stock of their respective companies.

<sup>17</sup> *Ibid.* Out of 446 companies furnishing organization schedules, there were reported a total of over 2100 directors, an average of roughly, over five directors to a company. Nineteen of this number held directorships in two or more companies in nominally opposing groups, none, however, being connected with more than two such groups, and 160 held directorships in two or more companies in the same group. These 179 directors held 458 directorships, and the companies in which they were interested cover more than 70 per cent of the industry aside from the production of crude petroleum.

<sup>18</sup> *Ibid.* For the oil and refining companies whose records were examined the attendance was found usually to be under 10, and some of the stockholders' meetings of the Continental Oil Co. were held by a single individual. For companies of the Standard Oil Co. groups, the attendance in persons

portant voting at meetings is done by proxies. This means of voting constitutes on the average 60 to 90 per cent of the voting done at most meetings.<sup>19</sup>

As for mergers, one need only observe the newspapers and current trade periodicals to appreciate how often and how many mergers are taking place in the petroleum industry.<sup>20</sup> The recent and very important acquisition by the Standard Oil Company of New York of the Vacuum Company was sanctioned by the District Court for the Eastern District of Missouri in February, 1931.<sup>21</sup> In the records of the parties to the suit, there were disclosed several very pertinent facts. It was shown that the Royal Dutch Shell and its subsidiaries, controlled in the main by British and Dutch stockholders, had produced 15 per cent of the world's petroleum in 1929. Most of its gasoline came from Venezuela. The figures in the opinion<sup>22</sup> indicated further that the Shell Company was first in crude production (1930) of petroleum in the United States, Texas Co., second, Standard of New Jersey, third, Gulf, fourth, Standard of Indiana, fifth, and Socony and Vacuum combined, sixth. In daily refining capacity, Standard of New Jersey ranked first, Shell second, Standard of Indiana third, and Socony and Vacuum fourth.<sup>23</sup>

A brief summary of the picture thus far presented would indicate a swing from control of the petroleum industry by one com-

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for the years 1922 to 1926 ranged from an average of four for the Standard of Nebraska to ten for the Atlantic Refining Co. The stockholders of the Texas Co. manifested the greatest interest in the affairs of the company with an average attendance of 72 at their latest reported meeting. This latter company is reported to have 30,000 stockholders in 47 states, the District of Columbia, Alaska, Hawaii, Philippine Islands, Porto Rico, Canal Zone, and a few stockholders in foreign countries.

<sup>19</sup> Federal Trade Commission, *Petroleum Industry—Prices, Profits and Competition*, *op. cit.* n. 6 above. See table on p. 82.

<sup>20</sup> Press dispatches of January 9, 1930, carried the announcement of the offer of the Standard Oil Co. of New York to acquire the White Eagle Oil and Refining Co.

<sup>21</sup> *U. S. v. Standard Oil Co. of New York* (D. C. E. D. Mo. 1931) 47 F. (2d) 288. The court pointed out that because of the complementary characters of the two companies it was in the interests of fair competition that they be permitted to compete as a unit with the other companies doing both nation-wide and foreign business. The Standard Company of New York does a nation-wide business in gasoline and fuel oil while the Vacuum Company does a comparatively small American business and a vast foreign business in high grade lubricants.

<sup>22</sup> See *U. S. v. Standard Oil Company of New York*, above, *l. c.* 311, 312, 313.

<sup>23</sup> *Ibid.* Of all the petroleum companies, 18 are doing business in 13 or more states, 12 in 20 or more states, 8 in 30 or more states, 5 in 40 or more states, and 2 (Texas Corporation and Royal Dutch Shell) are doing business in all the states.

pany twenty years ago, followed by disintegration into many smaller units, to the control of the industry by several very large companies. Furthermore, while twenty years ago the Standard Company was responsible for approximately 80 per cent of the refined products, today, the separate Standard companies in the aggregate control almost 25 per cent of the crude production and approximately 45 per cent of the output of refined products. About half of the crude is still produced by a very large number of individuals or small companies, but more than two-thirds of the "proven acreage" of oil bearing lands of the country is in the hands of nine Standard Companies and six independent companies.

A consideration of the facts summarized heretofore may be an aid to the formulation of some plan for stabilization. The plans which have been suggested by various authorities are too numerous and involved to be considered here. A brief study of some of these plans, which may be found in recent volumes of the Congressional Record and in other governmental documents, law journals, periodicals and treatises, will disclose that most of the solutions center their attention on the production end of the industry. From the economic standpoint, however, it would seem that possibly more effective control might be exercised through the refiners who are fewer in number. A national plan for cooperation among them would transcend irrelevant state lines. The resulting lack of a market for excess production of crude might well induce a voluntary control in the oil fields, which militia are now being used to enforce sporadically. The necessary revision of the anti-trust laws and the establishment of suitable regulation over a consolidated petroleum industry constitute a major challenge to statesmanship.

H. ROBERT SHAMPAINÉ, '32.

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## CONTRACTUAL LIABILITY OF DEFECTIVELY ORGANIZED CORPORATIONS

The approach to the problem of the judicial treatment of defectively organized corporations is one hedged about by many conflicting ideas and many concurrent considerations of which notice must be taken.<sup>1</sup> First of all it may be said that from the

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<sup>1</sup> The following factors must be considered: the nature of the body which has presumably been brought into existence; for what purpose the question of corporate existence is being urged; the nature of the defect in the corporate structure, and whether or not the particular defects are regarded in that jurisdiction as supermandatory, mandatory or merely directory re-