

CASE

TROUBLED SPAIN: LEADING ORGANIZATIONAL CHANGES THROUGH NETWORKS AND DESIGN¹

INTRODUCTION

James Reid, the new General Manager (GM) of Troubled Spain knew the challenge ahead of him was huge. He had six months to turnaround the Spanish subsidiary or it would be sold. Mike Low, CEO of Troubled Inc., made this clear during his last visit in January 2013. Mike had come to make sure that everyone – both management and employees – understood how serious the situation was. Troubled Spain had produced disappointing quarterly reports for several years and its management had been unable to correct the situation. The company was no longer sustainable and the board was ready to sell. However, Mike still believed that recovery was possible and he had convinced the board to give the subsidiary a last chance.

During his visit, Mike asked the GM of Troubled Spain to resign and he appointed James Reid as the new GM. He encouraged James to take any actions he deemed necessary to turn around the organization before June 2014. James – a Scotsman with a long history within Troubled Inc.– was VP for Production at Troubled’s European Headquarters in the UK. Although Troubled UK worked on a different production technology and served a different market, James knew Troubled Spain quite well because many operations were in common between the two sites.

During his first week on the job, James conducted a series of interviews with key people in the organization. Talking to them, he realized that much seemed to happen behind the organizational chart and through interpersonal relationships – something that he thought could be related to the Spanish culture and he, as a Scotsman, found it hard to understand. To get a grip on these informal dynamics, he asked Human Resources (HR) to hire a team of consultants to analyze the informal structure of the organization.

Looking at his notes from the interviews and at the graphs presented by the consultants, James wondered how he could make sense of all the information and formulate an action plan for the next six months. He knew that he had to be especially careful with his first action. As a newly appointed GM, all the employees were waiting to see what he would do.

THE SEMICONDUCTOR INDUSTRY

¹ This case was prepared by the Professors Eric Quintane, María Helena Jaén from the University of Los Andes and Professor Gianluca Carnabuci from ESMT, with the assistance of Research Associate Maria Luisa Pulido. Teaching cases are developed solely as the basis for class discussion and are not intended to serve as endorsements, sources of primary data, or illustrations of effective or ineffective management.

This case has been adapted from the real world –the names of the company and people have been changed for confidentiality purposes.

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The semiconductor industry emerged in the 1960's. Semiconductors were crystalline solids with special electrical characteristics. They had high resistance and diverse conducting properties, which made them useful for tasks like amplification, switching, and energy conversion. Because of these properties, the semiconductor industry was considered as a technology enabler business, as well as a driver of economic growth. The countries that dominated the global production were USA, Japan, South Korea, Taiwan, Singapore, and the European Union.

Innovation in the semiconductor industry affected directly electronic systems businesses and services, which represented approximately 10% of the world's GDP. Between 1993 and 2010, the semiconductor industry grew at an average of 13% per year, even though this growth was very volatile. Flexibility, innovation, and time to market were crucial for the industry not only to adapt to global change but also to anticipate it. The industry was associated with many technological devices that had a short life cycle and needed to be reinvented constantly. This growth rate had slowed down since 2010, yet forecasts were optimistic. In 2012, the industry had a market value of approximately \$290 billion (see Appendix 1 for additional information about the industry and about the company).

TROUBLED INC.

Troubled Inc. was a leader in the semi-conductor industry. The company manufactured and commercialized semi-conductor products that leveraged advanced technologies to transmit, amplify, regenerate and receive data. The company was founded in the United Kingdom in the late 1980's and grew very rapidly during the 1990's through acquisitions. The company became US-based at the end of the 1990s.

During the 2000's, the company was affected by the global economic crisis and the reduced growth of the semiconductor industry. Between 2006 and 2009, Troubled stock plunged from 50USD per share to 2USD per share. This resulted in frozen salaries, layoffs and closure of some of its assembly and test facilities in China. In the first quarter of 2009 the company faced losses of approximately 50 million dollars. As a result, Troubled Inc. merged with a large competitor creating one of the main suppliers of semi-conductors components. Out of the merger was born the current Troubled Inc., a company with global presence, with R&D and product/sales support in Europe, Japan, the United States and China. Since then, Troubled Inc. maintained worldwide manufacturing operations, R&D and chip manufacturing in the U.S., U.K., Spain, Japan, China, Malaysia and Thailand.

In 2012, Troubled Inc. underwent a series of additional radical changes in an attempt to overcome a severe organizational crisis. In less than six months, the CEO and Chairman of the Board and the CFO resigned. Both had played an important role in transforming the company into an industry leader. Different members of the board with significant operational experience in the industry were appointed as CEO, Chair and CFO to lead the organization towards financial stability. Less than a month after he was appointed as a CEO, Mike decided to sell off non-productive branches of the business for \$88.6 million. Mike explained, "this sale was the first step I took in order to reinvent the company." Yet, at a time when competitors were performing more than decently and forecast for the semiconductor industry showed that sales were expected to increase by 9.9% percent in 2013 and to keep growing through 2016, Troubled Inc. was still underperforming and Mike had to focus on problematic areas.

TROUBLED SPAIN

Troubled Inc. acquired Troubled Spain in 2002, which was the last of a long series of acquisitions for the Spanish subsidiary. Over the past twenty-five years it had been acquired three times, resulting in what many managers described as a heterogeneous organizational culture. As a result of this history of acquisitions, most managers knew each other from before Troubled Inc. acquired the company.

Troubled Spain had what industry experts widely regarded as the most innovative technology in the market to produce high-quality semiconductors in a cost-effective fashion. However, these same experts acknowledged that what Troubled Spain gained in technological innovation, they lost in speed of execution. The time from concept to prototype was twice that of competitors and the time from prototype to actual production nearly three times that of competitors.

In 2012, Troubled Spain had approximately 190 employees organized in a functional structure, with 11 departments reporting to the GM (see Appendix 2: Organizational Chart). The core of the company was centered around Manufacturing, Engineering and Research and Development. Together, these departments accounted for roughly 70% of employees in the organization. These core functions were supported by a supply chain department, in charge of ensuring an effective interface with suppliers around the world, and a logistics department, in charge of planning for priorities in terms of production. Support functions also included a sales department with two employees who dealt with customers and large accounts, a marketing department with three employees, and four employees in charge of Customer Service. Finally, there were two employees in Human Resources.

The Production Process

Manufacturing was organized around two lines of production: front-end and back-end. These manufacturing lines did not actually manufacture a final product, but prototypes. The first production line was called front-end because it was in charge of the chip: the heart of each product. The back-end was a smaller line in charge of assembling prototypes. There were 75 operators working in the front-end production line and 15 in the back-end production line. Operators were divided into three shifts that were directly supervised by shift managers. Each shift team had approximately 24 operators and a shift manager. The back-end line, where the prototype was produced, used to be part of the R&D department but it was now part of Manufacturing. The back-end line was the interface with subcontractors in Thailand where the manufacturing took place.

A typical production process was the following:

- 1) Engineering, Purchasing and R&D worked together to establish the required specifications for the chip.
- 2) After these specifications were defined, Purchasing searched for suppliers that met the company's quality standards.
- 3) R&D produced the prototype of the chip with the front-end line. R&D worked with Engineering and Manufacturing to solve potential problems.
- 4) Once the chip was produced, R&D and Manufacturing made a prototype of the assembled product in the back-end line.
- 5) Testing took place at a contractor in Thailand. R&D and Manufacturing revised together the assembling process. If it worked correctly, R&D sent the prototype to Thailand to start production.

KNOWING PEOPLE AT TROUBLED SPAIN

James needed to define an action plan to turnaround the organization within six months. While James was familiar with the production process, he did not know the people at Troubled Spain well and had only a superficial understanding of the challenges that the unit was facing. His first conversation was with Maria Torres, HR Director. Maria oversaw all strategic Human Resources Management, which included employee evaluation, hiring, remuneration, promotions and terminations. Furthermore, many people saw a confidant in her and, therefore, she was well informed about issues and sentiments across the company.

Maria Torres – HR Director

Answering James's question regarding the problems she perceived in the organization, Maria mentioned issues between R&D and manufacturing:

It is pointless to hide that there is great tension between Manufacturing and R&D. We try to differentiate between these two teams, but they are actually very similar and their functions and roles get confused. People in R&D want to distinguish themselves from manufacturing to focus more on innovation and research. However, this is only possible when there are sufficient resources. Frequently, they do not know what their responsibilities are: both teams say that the other team has to take care of the job. So even if there is a formal distinction, there is no real distinction in practice. This situation generates conflict, especially because of the lack of communication between the two teams. They barely exchange information and this makes the division of tasks and responsibilities confusing.

Following the conversation with Maria, James decided to talk to other employees at Troubled Spain, to gain a deeper understanding of the issues that he was facing. Some elements of these conversations are reported below (see Appendix 3 for a list of employees that Steve interviewed).

Victoria Rivera – Manufacturing Director

One of the first conversations James had was with Victoria Rivera, his Manufacturing Director. Victoria explained her role as follows:

My role has changed a lot over the years. However, to simplify, I mainly deal with production. I am ultimately responsible for both lines of production: front-end and back-end, around 100 employees. I also look after the maintenance of the production equipment and facilities. With my assistant, I analyze the production and identify the bottlenecks and problems. Our production cycle is quite long because we take approximately 8 weeks to transform raw material and inputs into the final product: the chip.

Victoria was highly committed to the organization and had a deep sense of responsibility regarding her role and actions. She also held strong opinions regarding the problems the organization was facing:

In Troubled Spain all the managers have worked here for a long time and they are all from my generation. We could say that we all know different parts of the process because we have rotated and changed roles several times, working for different specialties such as logistics, quality and process. Instead, the R&D people are more specialized and typically stayed in their job. That is one of the reasons why we remain a divided company. Because since our core as a company is technology all people think that people who are in charge of technology are the most important ones and essential. But this is not true. Our success depends on many factors like production and quality. Nevertheless, those areas are underestimated and we do not even realize it.

I believe that the company is experiencing an identity crisis. If you ask around what company values are or if people feel that they belong to the company, I am not sure of what the answer might be. We are in search of a leader, and it is clear to me that we must begin the pursuit to find one.

Luis Marin – R&D Director

The following conversation was with Luis Martin, R&D Director. James asked him about his responsibilities in Troubled Spain. Even though Luis had only been working for the company for 4 years, he was very committed to the organization and to his team. Emphasizing the role of his team, Luis commented:

My team is composed of about 25 people divided into five subgroups. My R&D department does little research and a lot of development. We are in charge of developing prototypes of new products that will be later the core of our sales. We design the chip that is the heart of our products but we also design the process of assembling all the other parts that revolve around this chip. Our prototype line allows us to produce up to 50 to 100 units, in order to make sure that everything works properly. While we make everything regarding design, research and development of prototypes in Troubled Spain, production is done in Thailand.

Analyzing the responsibilities of R&D at Troubled Spain, Luis concluded:

There is a cultural problem in Troubled Spain, especially at the managerial level: people are under the impression that if the development of a product was not successful, it is R&D's responsibility. R&D is not responsible and cannot be blamed for every mistake that is made along the product development process. I wish people were aware that it is not only R&D's job to develop and produce new products. Since we work together with Manufacturing, we should share and assume the responsibility of each project. R&D is in charge of the prototype. If the prototype goes wrong it is our responsibility. However, if the development of the prototype is successful but the manufacturing of the prototype goes wrong, this is out of my control and another area should take responsibility.

Even if R&D plays a central role in the company, I think it is difficult to say there is a common identity of the members of the R&D team because everybody feels from a different area.

David Johnson – Product Engineering and Quality Manager

James was interested in understanding the role of the Engineering team. His next conversation was with David Johnson, Product Engineering and Quality Manager. David stated:

I am in charge of two teams: Quality and Product Engineering. In Product Engineering, our team focuses primarily on the production line. The Quality team is divided into two sub teams. One team helps suppliers and makes sure that our materials have the required specifications and the other one ensures that our products comply with the clients' demands. I am also in charge of the improvement and supervision of production processes. Over time, the emphasis of my work has shifted from quality in the prototype line (R&D), to production (raw materials) and finally to Product Engineering, which is a hybrid between engineering and technical support. We are in charge of controlling the production process and solving external problems. In addition, we are in charge of analyzing and forecasting production costs. Finally, I am responsible for supporting R&D during the testing process.

James asked David to give his opinion regarding the main challenges faced by Troubled Spain. David commented about the relationships and responsibilities as they had evolved over time:

I have been in this company for almost 20 years. I have worked as a Process Engineer, Product Engineer, Quality Manager, and I have changed roles many times. I think the organizational

structure in Troubled Spain is affected by its history, since now there are unclear boundaries between different areas. Most of the people that work here, at least at a managerial level, have been in this company for over 15 years and have changed responsibilities in numerous occasions. This means that there are informal relationships that were developed over time that can affect directly the company's performance. For example, business units select senior managers to manage their projects, but without coordinating with other business units that might be affected, or with program management. This means that there are multiple individuals who make decisions (i.e., project managers) but without having enough information about other projects or sufficient authority to make those decisions. Hence, when there is a complication each team makes temporary decisions that are not necessarily in the company's best interest and that are often reversed later in the process.

Susana Leal – Program Manager

James knew that he must have more information about the coordination around product development. His next conversation was with Susana Leal, Program Manager. She explained:

My formal role is Program Manager. I take care of managing research projects, from the stage of concept creation to production. I define the project scope and deliverables, schedule product transfers to manufacturing and ensure that projects reach their milestones and ultimate completion.

I am a person who has to interact with all levels and roles. My job is basically management, time scheduling and statistical analysis, I serve as a bridge between various positions. I have a slightly odd position within the organization because I am not part of the top management, but I am not a part of the hierarchical level below. So let's say I am in a somewhat intermediate position.

Susana highlighted communication problems at all levels as well as leadership issues:

There are many people in this company that have serious communication problems because they do not share information. Although we have different projects and roles it is important for everyone to know what the problems and goals are. Sometimes there are production problems that can affect all projects. This organization deals with all issues in an individual way, without realizing that we should all thrive to achieve the same goals. We do not have a clear vision of who our leaders are since all the important decisions are taken outside the company.

Ines Medina – Production Manager

Going deeper into the internal dynamics at Troubled Spain and trying to grasp the work at the Front-End and Back-End production lines, James interviewed Ines Medina, Production Manager. Ines reported to Victoria and was in charge of the Front-End production line. In her words:

I have to work with Engineering because they are the ones that can help when problems arise and we encounter problems every day. I would say that most of the problems come from difficulties with communication. The hierarchy in this company is incomprehensible and coordination between managers is practically inexistent.

Commenting on her responsibilities, Ines remarked about the relationship between manufacturing and engineering:

My main objective is to ensure that we are able to produce components on schedule. Every day I supervise the production process and make a list of problems that the operators encounter. There might be all kinds of problems: materials that are missing, design of the product or time delays. The most common problems occur because materials do not arrive on time or because of a lack of information or missing specifications from Engineering. However, when I need help from Engineering because we encounter problems, they act as if they were doing us a favor, and they ask for favors in return. I find this strange because we are supposed to be working together.

Analyzing the factors that affected her performance and the effectiveness of her team, she concluded:

It is difficult to identify what the main problems are because we have too many. In theory, we all work for the same company but in reality, this is not how we work. Each area has a different goal, we do not share our objectives, and sometimes they even generate conflicts between areas. Moreover, I think that we have too many managers. They do not help each other, if there is a problem that concerns them but is not directly related to their tasks they ignore it. This is reflected in our formal and informal relations. People are not motivated to come to work, we used to be friends and we organized dinners together, now we barely talk.

AUDIT OF THE INFORMAL STRUCTURE

As James grappled with the issues raised by the interviews, he realized that he would go nowhere if he didn't have a better understanding of the intricate patterns of relationships and conflict in the organization. Consequently, in a conversation with Maria Torres, HR Director, he decided to contract a team of external consultants to do a systematic analysis of the informal structure of his organization. He asked the consultants to provide him with information to answer specific questions. He wanted to understand how strained the relationships between departments that had to work together were. He also wanted to understand if the problem was based on a lack of communication. Finally, he wanted more information on leadership at different levels in the organization.

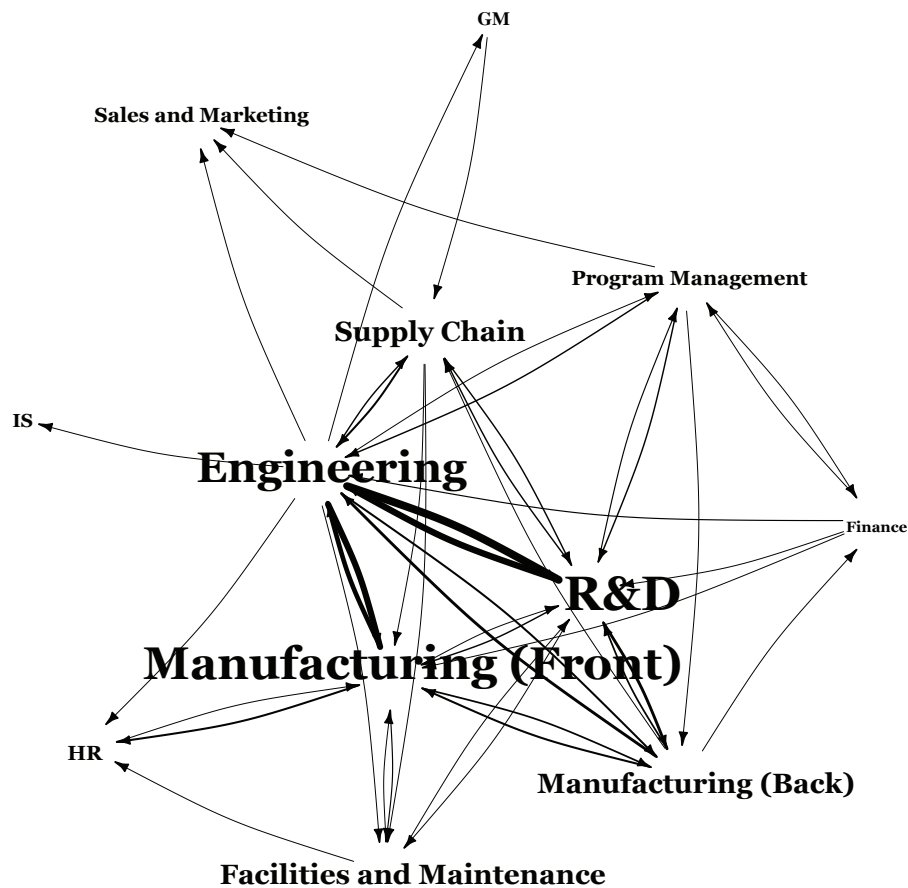
The consultants administered a survey (see Appendix 4) to all employees asking each of them who they depended on for their work and how good was the relationship with that person. They also asked who each employee communicated with on a daily or weekly basis, especially from other departments. Finally, they asked who employees saw as informal leaders in the organization. Figure 1 provides a visual representation of the main difficult interdependencies between departments. Figure 2 provides a visual representation of the communication flows between the departments. Figure 3, represents the distribution of informal leadership in the organization. Complementing the figures, the consultants also provided a table with the number of incoming and outgoing difficult interdependencies and communications links between departments (see Appendix 5).

Interdependencies and collaboration

Figure 1 showed which departments depended on each other and also had difficulties working together. The bigger the name of the department, the more people outside of the department indicated that they depended on this department to do their work and also indicated that the collaboration with employees in this department was difficult.

The position of the department in the chart indicated how central the department was in the network. For example, if a department was in the center of the graph it means that many other departments identified that they depended on and had a difficult relationship with employees in it. By contrast a department located at the periphery of the graph indicated that few other departments depended on and had difficult relationships with its employees. Also, the more employees in one department identified employees in another department as a source of interdependency, the thicker the lines between the departments

Figure 1 – Difficult Interdependencies and collaboration

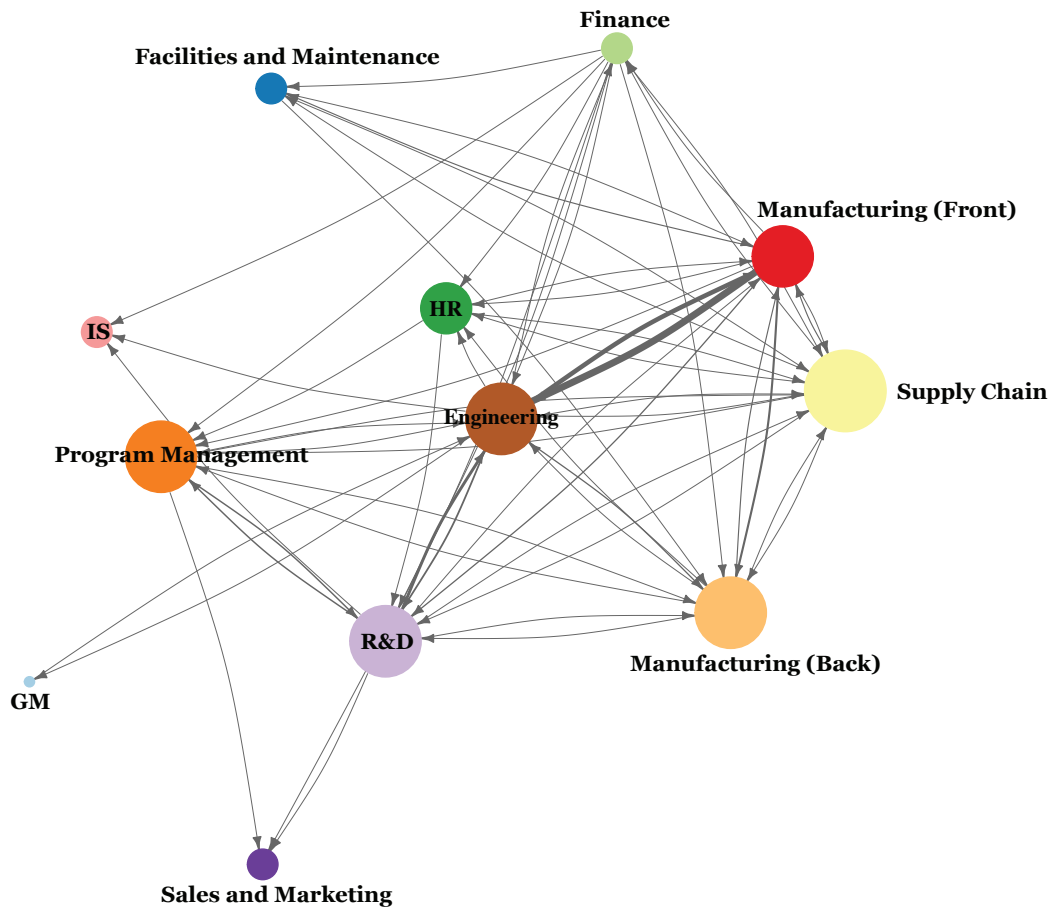


Source: Troubled Spain Consultants' Report, 2015.

Interdepartmental Communications

Figure 2 provided a map of communications among departments. The bigger the size of the circle corresponding to the department, the more people outside of the department indicated that they communicated with someone in the department. Similarly to Figure 1, the more employees in one department selected employees in another department, the thicker the line between the departments. Again, the position of the circle in the graph provided information about the centrality of the department in the communication network, with circles more central in the graph indicating communications with multiple other departments.

Figure 2 – Communications

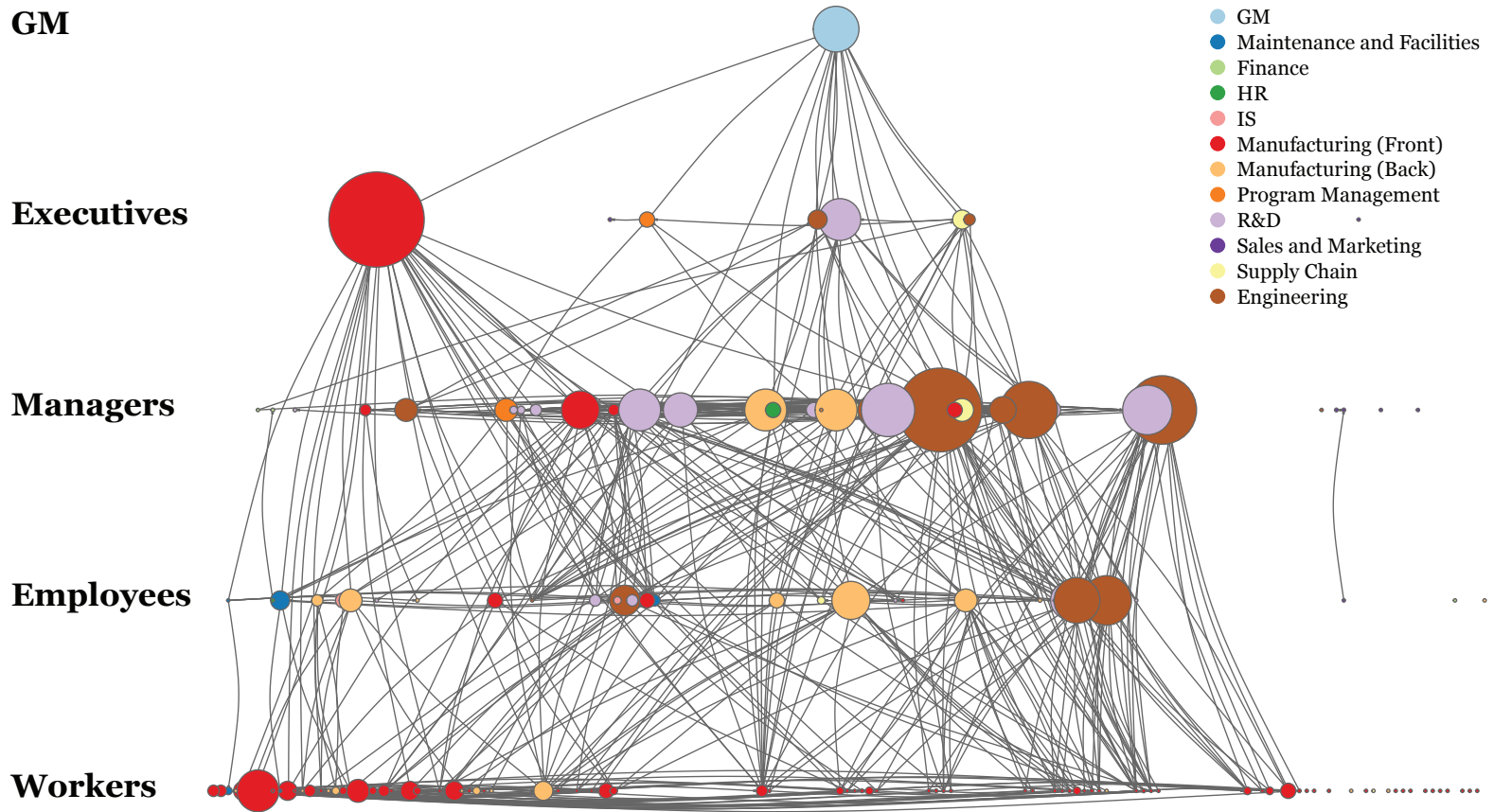


Source: Troubled Spain Consultants' Report, 2015.

Informal Leadership

In this graph (Figure 3), employees were organized hierarchically, with James at the top and each row representing a different hierarchical level. The size of the circles represented the number of times that a given employee had been named as an informal leader by another employee. Each line represented an employee naming another. The colors represented the departmental affiliation of each employee.

Figure 3 - Informal Leadership



Source: Troubled Spain Consultants' Report, 2015.

James spent time looking at each of the graphs while sipping his coffee. After a good hour of pondering their meaning, he went to see Maria and commented,

These graphs on the informal structure are really insightful; they are like a radiography of the organization. Look at this graph with difficult interdependencies (Figure 1). Engineering, R&D and Front End Manufacturing really seem to have difficulties getting along with each other, and with everybody else.

But when we look at the second graph, showing communications between departments, R&D and manufacturing are not communicating much with each other (Figure 2). Also, don't you think that Program Management should be in the center of this graph?

It took me much time to understand what the leadership graph (Figure 3) meant. Actually, I think that it provides much information about the internal dynamics at Troubled Spain... It shows the executives and managers that are recognized as informal leaders, the leadership structures, and who empowers her/his subordinates; Maria, do you consider that the Executives have been good role models to their employees, helping them grow over time?

WHAT SHOULD JAMES DO?

James was reflecting on what he had been able to learn about the company in his first few weeks. Looking at his notes from the interviews and at the graphs presented by the consultants, he felt that he could turn the company around, but he also realized that six months was a very short time and he needed to be careful about which decisions should be made first and how he should proceed.

James pondered about the challenges he was facing. He thought about problems linked to the formal organizational design of the company, as some of the performance issues related to the ability to integrate information, people and activities between departments and especially between R&D and Manufacturing. The second type related to the informal network, the structure behind the chart. James concluded:

Because employees have worked for years together in different roles and positions, the informal relations that developed between them became more reflective of what they can do than the formal chart. Unfortunately, this also means that deep seated interpersonal conflicts have a disproportionate impact on collaboration.

Multiple options presented themselves to James, but how and where should he start?

Will a change in the formal organizational design be sufficient to change people's patterns of interactions and behavior in the various departments involved or will employees simply ignore these changes in the formal structure?

Should I focus on addressing the difficult relationships between specific individuals in R&D and Manufacturing?

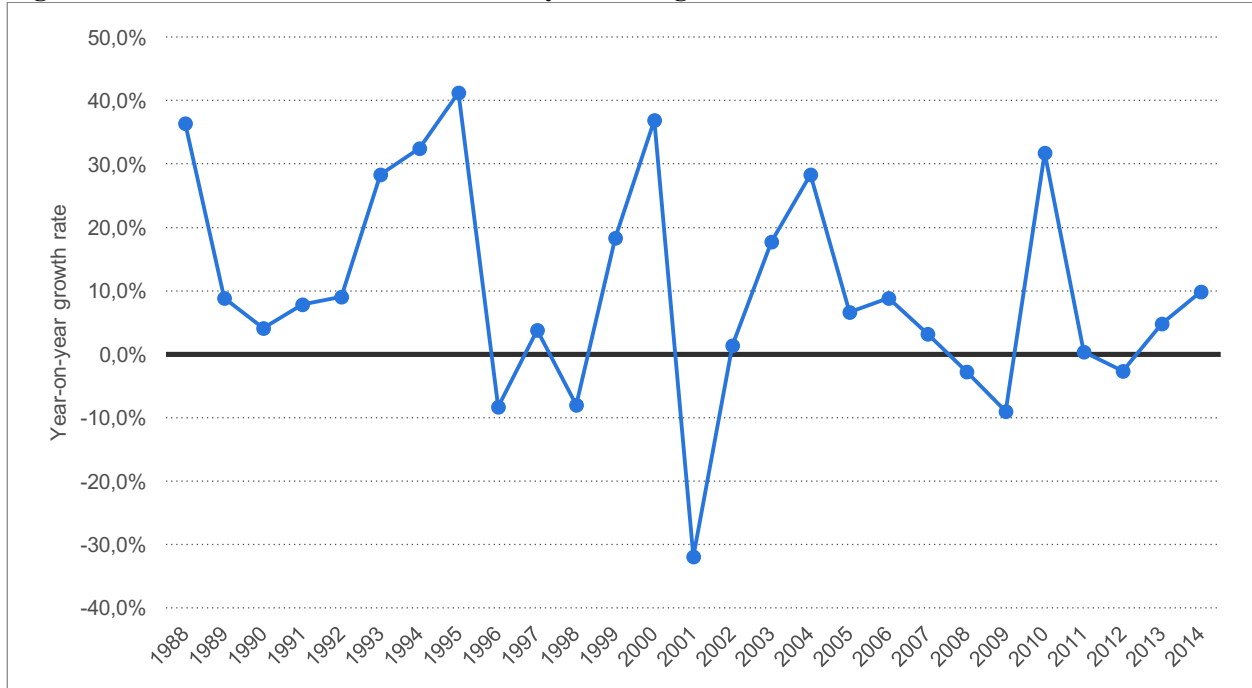
Maybe a solution that includes both formal and informal together would make more sense? For example, I could redefine the role of Program Management to act more as a liaison between Manufacturing and R&D.

But James pondered, "Is this change even possible given the informal structure of social relations and especially the informal leadership structure of the organization?"

As James was thinking about these options he thought about the leadership in Troubled Spain. "Which of my executives can I rely on in order to implement the change?" James was optimistic, but clearly he needed to find answers to prioritize his actions and elaborate a clear plan to turn a company with such a long history around in six months.

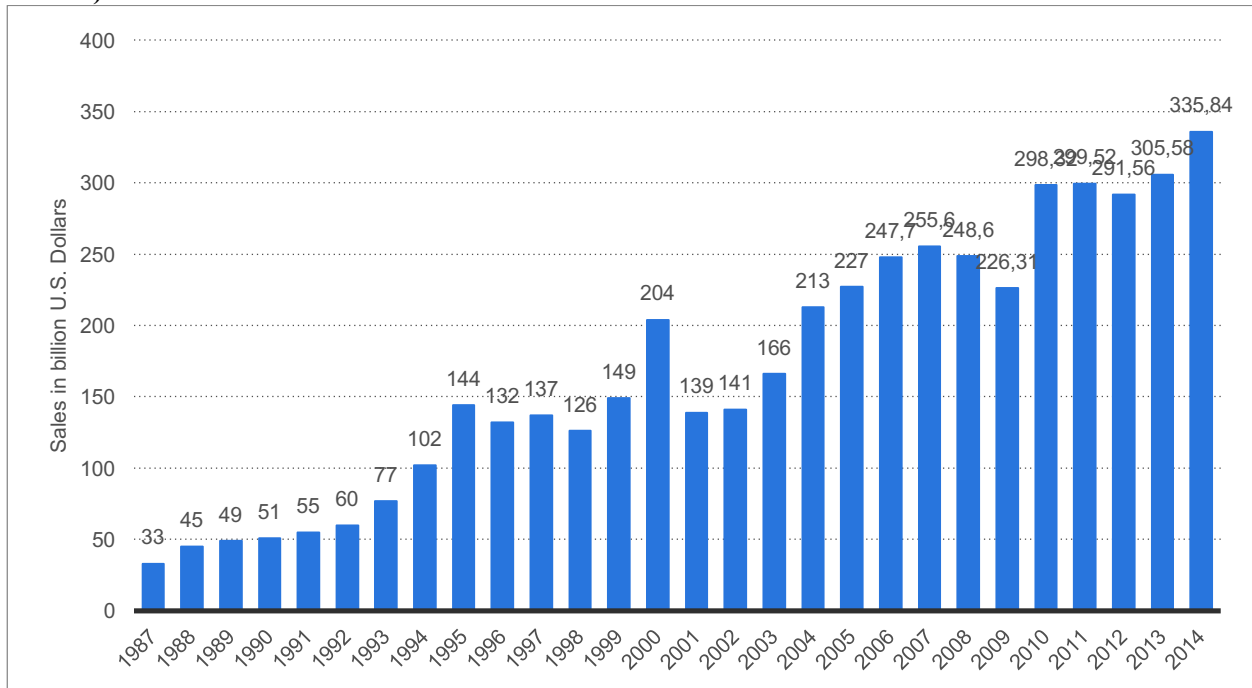
Appendix 1 – Industry and Company Information

Figure A1.1. Global semiconductor industry revenue growth from 1988 to 2015



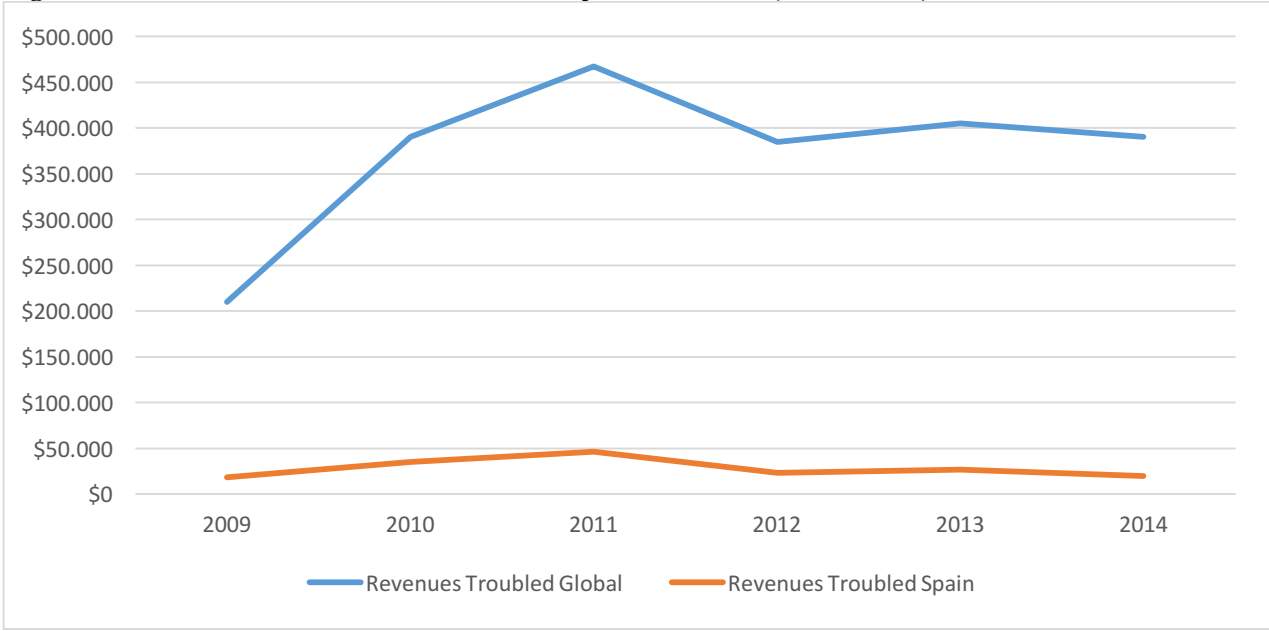
Source: WSTS; ID 266976

Figure A1.2. Semiconductor sales worldwide from January 1987 to June 2014 (in billion U.S. dollars)



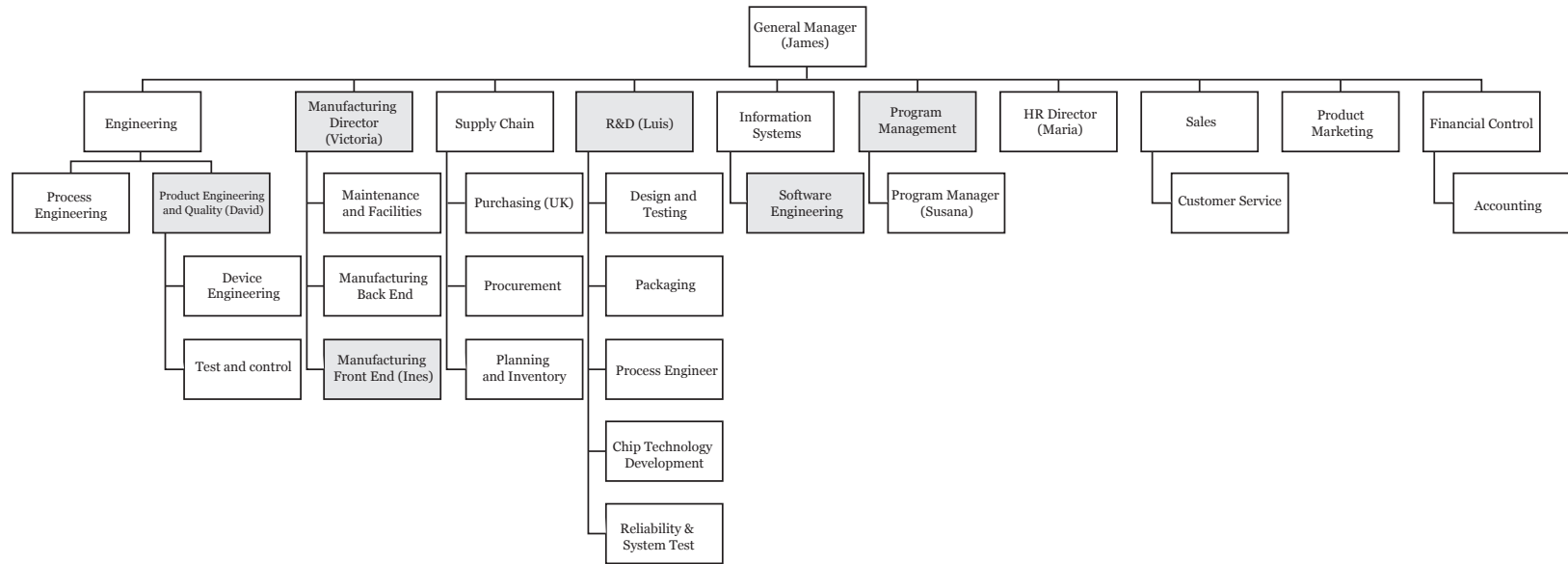
Source: WSTS; ID 266973

Figure A1.3: Troubled Global and Troubled Spain Revenues (2009 - 2014) In Thousand USD



Source: Reconstituted from Company's Archives.

Appendix 2 – Troubled Spain’s Organizational Chart



Source: Reconstituted from Company’s Archives.

**Appendix 3 – Employees that Gave James Reid Deep Insights into Troubled Spain’s Challenges:
Profile Information**

Name	Position	Key background information
Victoria Rivera	Manufacturing Director	Victoria was the Manufacturing Director. She has been in this role at Troubled Spain for 3 years. Victoria had a wide range of functions within her job because she also was in charge of supervising the Maintenance of infrastructure and Quality. She also worked for 7 years in Troubled Spain as the Quality System, Facilities & EHS Manager from 2004 until 2010. Before that she worked as a Quality System Manager for 6 years at Troubled Spain.
Luis Martin	R&D Director	Luis had worked for Troubled Spain since August 2009 as the Engineering and R&D Director. He was previously a Product Development Manager and Packaging Technology Manager at another company for 2 years and 4 years, respectively. He studied Engineering and Physics and worked for several years in semi-conductors.
David Johnson	Product Engineering and Quality Manager	David worked for Troubled Spain in the Engineering Department, as a Product Engineering and Quality manager. He had worked for the company since 1995 occupying different positions in engineering and quality.
Ines Medina	Production Manager	Ines worked for Troubled Spain as Production Manager in the Front-End line since 2009. Before that, she had a similar role at a large organization for about 10 years.
Susana Leal	Program Manager	Susana was the Program Manager at Troubled Spain and had worked for the company for over 4 years. Susana was in charge of managing projects, coordinating team meetings, and structuring and scheduling project plans.
Maria Torres	HR Director	Maria has worked at Troubled Spain, as Human Resources Manager, for 3 years. Prior to her employment at Troubled Spain, she had worked in multiple companies in various Human Resources roles. She has a wide experience developing organizational projects, recommending policy improvements and implementing organizational changes.

Source: Elaborated based on Company Official Documents.

Appendix 4 – Consultants’ Report: Survey Items Used by the Consultants

<p>Work Relationships, Interdependencies and collaboration (Figure 1)</p> <p>Q1. Often, the quality of our own work depends not only on ourselves, but also on the work done by other people. The quality of our work may depend on colleagues operating within or outside our function or workgroup, and it may include our collaborators, peers, superiors, or reports. We want to understand whom you depend on when carrying out your work. By "depend on", we mean that if a person does not do his/her job well (for example, he/she does not provide you with the information you need or does not complete his/her task competently) then, doing your job well becomes difficult. If this person does his/her job well, on the contrary, the quality of your work increases. Keeping this definition in mind, select the persons on whom your work depends. You may select as many persons as you wish.</p> <p>Q2. Consider your experience, over the past year, with each of the persons your work depends on. To what extent would the quality of your work improve if the two of you managed to work better together?</p> <ol style="list-style-type: none"> 1. Substantial room for improvement, we often fail to coordinate effectively 2. Some room for improvement, we sometimes fail to coordinate effectively 3. No room for improvement, we always coordinate effectively <p>In figure 1, only relationships where there is substantial room for improvement are represented.</p>
<p>Communications (Figure 2)</p> <p>Q1. Over time, people tend to develop informal relationships with colleagues with whom they regularly discuss work-related issues. The ideas that we exchange with our contacts may have to do with technical problems (e.g., how to improve a product, process or service on which we are working), or with issues related to the internal “political” or organizational dynamics of the company. Think about the past twelve months: who among your colleagues was a stable source of communication and information exchange for you? You may select as many persons as you wish.</p> <p>Q2. Going back to the last question, how often over the past 12 months did you exchange ideas and information with each of the persons you mentioned?</p> <ol style="list-style-type: none"> 1. Once every 2-3 months 2. Once or twice a month 3. Once or twice a week 4. Every day or almost <p>In figure 2, only communication relationships with a frequency of “Once or twice a week” or “Every day or almost” are represented.</p>
<p>Informal Leadership (Figure 3)</p> <p>Sometimes, in the workplace, there are people who are role models for us, in the sense that their ideas and behaviors influence the way we think and act and are for us a source of inspiration. Please indicate who, among your colleagues, is a role model for you. You may select as many persons as you wish.</p>

Source: Troubled Spain Consultants’ Report, 2015.

Appendix 5 – Consultants’ Report: Number of Incoming and Outgoing Communication and Difficult Interdependencies Links by Department

	Communications (Figure 2)		Difficult Interdependencies (Figure 1)	
	Incoming Links	Outgoing Links	Incoming Links	Outgoing Links
GM	1	1	1	1
Facilities and Maintenance	3	3	4	3
Finance	3	9	2	4
HR	5	4	3	1
IS	3	0	1	0
Manufacturing (Front)	6	8	7	5
Manufacturing (Back)	7	6	4	5
Program Management	7	5	3	5
R&D	7	7	7	6
Sales and Marketing	3	0	3	0
Supply Chain	8	8	4	5
Engineering	7	9	6	10

Source: Troubled Spain Consultants’ Report, 2015.