#### **Industrial Trip to Turkey 2022**



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National University of Sciences and Technology (NUST)

Islamabad, Pakistan

(2024)

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A thesis submitted to the National University of Sciences and Technology, Islamabad, in

partial fulfillment of the requirements for the degree of

Executive Masters in Business Administration

Supervisor: Dr. Kamran Khalid

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National University of Sciences and Technology (NUST)

Islamabad, Pakistan

(2024)

#### BUSINESS PROJECT ACCEPTANCE CERTIFICATE

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## Abstract

The three courses I have chosen are as follows:

Course	Course Specifics		
Project Management	Associate Professor: Ozan Altin Day: 2 Aug 2022		
	<b>Time:</b> 10 - 12		
Financial Reporting & Analysis	Professor: Mehmet Umutlu		
	Day: 1 Aug 22		
	<b>Time:</b> 10 -12		
ENOVA: Entrepreneurship &	Associate Professor: Ozan Altin		
Innovation	<b>Day:</b> 3 Aug 2022		
	<b>Time:</b> 10 - 12		

Table 1 Overview of courses selected

My primary motivation for focusing on these three courses is their relevance to my educational and professional background so far, however, they are not limited to just the past. They align with my future career aspirations as well, which I will expand upon in sections pertaining to each subject. The courses themselves were quite concise at 3 hours each, however, that did not take away from the fact that I walked away with a plethora of learnings which I will attribute to well-versed faculty in their respective domains.

For me, the industrial trip delivered on all my expectations that I had going into it. The trip was planned in a way to ensure that all participants had ample time to explore cities of Turkey along with the lectures and the industrial exposure. The trip provided me with much needed time away from the daily routine that I have gotten into ever since I have stepped into a Senior Management role. I was essentially able to experience life as a student once again, albeit very briefly, yet still a worthy experience.

This summary will mostly focus on the educational aspect of the trip; however, I will utilize this introduction part of the write-up to highlight the social aspect of such visits. I was able to experience the Turkish culture first-hand which to me was as valuable as the academic outcomes. In Istanbul, I met a lot of welcoming people who were more than happy to help out when needed and got to experience the Muslim history and culture of their wonder years first-hand. It also gave me an opportunity to reconnect with my EMBA batch mates as well, one of them I had not seen in 2 years.

Izmir for me had the warmest people, it became a second home to me as well and if given the opportunity I would like to live there. A city by the coast where there aren't that many tourists and you can actually experience how locals go about their lives. I came to know through Sir Adeel that residents of Izmir are of Greek descent, therefore, are very welcoming and openhearted. This proved true in my interactions during my time there. The most impactful part was

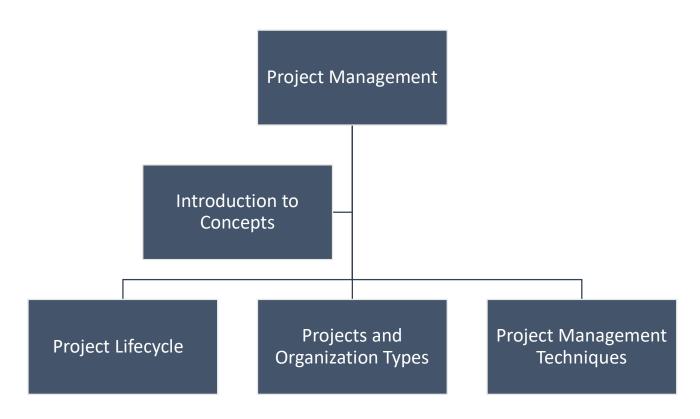
the interactions at Yasar university itself which as stated above I will expand in each of the course's sections below.

## 1. Project Management

#### 1.1. Reasons for Selection

Perhaps the simplest justification for selecting this course for my write-up is my current role where I am serving as a Project Director and having to manage multiple incoming projects all with varying deliverables. I have been studying up for a certification in Project Management and the learnings from this course have slotted in perfectly well with my preparation.

Furthermore, another key reason is the instruction style of the instructor, who delivered his lecture and used contemporary business issues and challenges to drive his point home which made for quite an engaging lecture for us all participants.



#### **1.2.** Lecture Structure

Figure 1 Basic Structure of the Project Management lecture

#### 1.3. Basic Concepts

Basic concepts of a project are something we are all familiar with. They have become the norm and everyone no matter their role is bound to come across them one way or another. Ever since

the concept of remote work and tools to support remote have become widespread in a post-Covid world, project management as a skill has gained significant demand.

To look at what makes something or qualifies a certain task/set of tasks as a project is essentially the following:

- Explicit and achievable objectives
- Limited lifespan
- Inflows and outflows managed against a set budget
- Uniqueness
- Risk and Uncertainty

I will expand on these points using my own understanding derived from within the lecture as well as during my work.

*Explicit and achievable Objectives:* We often hear of horror stories of projects not delivering on customer expectations and the mismatch between what was expected and what was delivered. Even if the outcome is as expected it still often does not provide the level of usability that was initially expected. This then signifies the importance of both the project team and the customer sitting down and defining explicit scope of work and deliverables; agree on what is possible within scope, what is possible by expanding scope and finally what is not going to be possible no matter what. The challenges to be expected should also be discussed by the project team to ensure the customer is educated and prepared to overcome them.

*Limited Lifespan:* A project will not be a project if it is expected to go on indefinitely, that would then be something which is a part of regular operations. Furthermore, a timeline of when it should or must end also helps lay out milestones and final deliverables. This is especially important when you look at projects from an Agile methodology.

*Inflows and outflows against a set budget:* Similar to the need for a limited lifespan, a budget is also mandatory to ensure effective management of the project, it defines one of the key inputs i.e. resourcing which has a significant impact on the scope as well. When milestones are put into place, they must also be linked to financial metrics. Along with the deliverables this defines the success and efficiency of the project.

**Uniqueness:** The objectives of the project have to be unique, and this is why projects are so critical to the future of the organization. They set out to achieve which has not been tried before whether to ensure operational efficiency or create an entirely new product line, nonetheless, this uniqueness is a key ingredient of a project and also belies the importance of a project. More often than not, outcomes of projects have significant impact on the future of organizations.

**Risk and Uncertainty:** With the importance of projects and their impact on the future viability of the customer organization there will be certain inherent risks, and with the uniqueness involved it also introduces significant uncertainty. There are measures taken to reduce risk and uncertainty, however, some risks will be inherent to the nature of the subject organization and the nature of the project involved as well as its extent.

To summarize, all of the elements above are interconnected and none of them is mutually exclusive. To execute a successful project, the management team has to run a tight ship with respect to these 5 key areas.

#### 1.4. Project Lifecycle

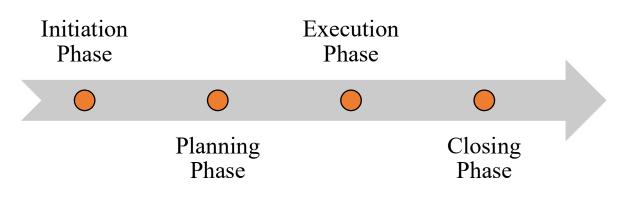


Figure 2 Project lifecycle phases

A project lifecycle is very broadly divided into four phases, the nature of these phases is directly correlated to the activities being undertaken or expected to be undertaken in each phase.

Initiation Phase is where the stakeholders look at the project/subject matter from afar and define a broad level of understanding supported by a high-level plan. This would include understanding of the problem, the scope, what and who relates to the project. A key activity here is engagement with the stakeholders.

Planning Phase is where the understanding in the previous phase is given a tangible form where it can be acted upon. The deliverable is broken into milestones which are becoming very critical as we enter into an age where Agile is becoming the norm. Furthermore, perhaps the most critical activity performed here is the risk identification and risk management plan.

Execution Phase is where the plan and its activities are put into motion and a constant review process is undertaken to ensure that the project stays on track and any and all deviations are accounted for and included in future projections. Any iterations and amendments required are also catered for at this stage.

Closing Phase is where the project is wrapped up, regardless of success or failure. A review is done of the key learnings during the project and how they can be applied to future projects. This phase is usually the phase with the most amount of documentation in the form of reports, manuals and process flows. The section below goes into further detail on all 4 of these phases.

#### Initiation Phase:

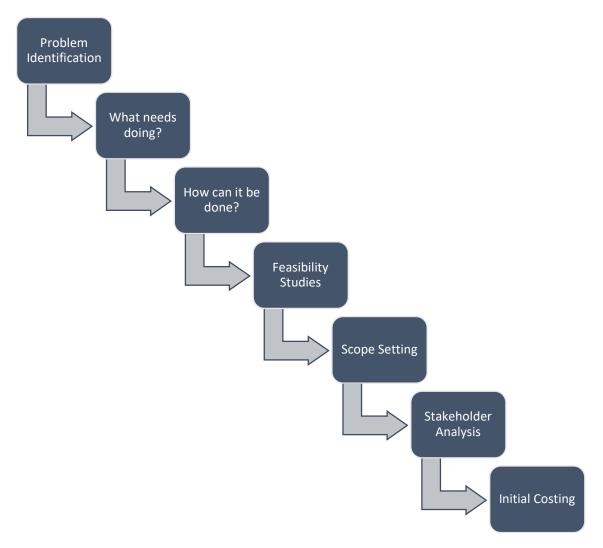


Figure 3 Flow of activities in the Initiation Phase

This stage is essentially comprised of a lot of meetings, discussions, analyses and documentation preparation. Meticulous preparation is key to successful completion of a project. However, looking at project management philosophies there are two different schools:

1. Waterfall methodology: This is essentially what the flow above is meant to describe. Here the teams would be meticulously preparing documentation and ensuring everything is in place and significant portions of scope are locked in before any tangible work begins

2. Agile methodology: This is the more recent approach being used very commonly and is popular among projects which are based on technological deliverables. Here only the necessary documentation will be prepared whereas the rest will continue to evolve as work progresses.

This is an area of the project strongly linked to practical learning for me. It is a very wellknown fact that ERP implementations are notoriously difficult to manage and achieve success in. Often, they fail due to either over-promising what the system/platform or the team is capable of or the resulting scope creep due to client expectations.

Waterfall has been the norm throughout the 20<sup>th</sup> century, however the advent of the 21<sup>st</sup> century and especially 2010 onwards Agile methodologies have taken up pace. The core reason is that majority of the projects are now centered around IT with either software of platform developments being delivered.

When it comes to ERP or IT related projects the waterfall methodology unfortunately falls short and Agile has significantly more chances of succeeding. Waterfall looks at deliverables being dependent on each other and are planned in a way that they can be delivered in order, so this is an exercise of gradually building up to the final product piece by piece where none of the pieces by themselves are of any tangible value to the customer until they form the final product. This then poses a significant problem, there is no way to test the system until everything is ready for a go-live. Even after go-live, there is a period of time where the consultants/developers and experts from the client are working on the system together and with their level of knowledge they are more tolerant of bugs and can workaround usability issues. Finally, the product reaches the mass audience once this stage is completed, at that point any issues that arrive are now a significant problem as the development phase has lapsed and there is only room for minor changes. Furthermore, in a lot of ERP implementations the product delivered does not live up to the client's expectations one way or another and there is never a way for the client to know this before the closing stage because they rarely get their hands on a working iteration of the system/product.

This is where Agile has gained significant value and support over the years, Agile works in a way where planning and execution phase go hand in hand for most of the product lifecycle. A concrete plan is not laid out at the start like waterfall and instead a broader plan is created which has room for flexibility. This also goes in tandem with keeping the client as a partner in the development of the system as opposed to a customer or even an opponent in some cases which is often the waterfall mentality due to the rigid planning system. During development, iterations are created, and the customer gets to test the iteration at every stage and provide their feedback due to which the customer also participates in keeping the project on track and ensuring that the progress towards the final product is something both the customer and the developer can tangibly see. Any changes can be instantly captured and implemented as the process leaves a lot of room for amendments in future iterations. The team has more capacity to quickly respond to any change requests and include them in the plan if they do not deviate from the agreed scope.

This is the reason that Agile is significantly more mainstream now and a big part of the project management certifications now-a-days. While not completely but it has been able to counter the problem of big-name ERP implementation failures and not just ERP, IT implementation failures. These projects often have a lot at stake and bring about social change, therefore, any failures can have a significant impact on the company's bottom line which in turn means people losing jobs with today's economy.

#### Planning Phase:



Figure 4 Flow of activities during the Planning Phase

This is the phase where a project takes up a tangible form and is broken down into milestones and beyond that tasks and sub-tasks. With this, costs and timelines are also assigned to each metric defined. Furthermore, the risk management process takes shape in this phase and is then used as a framework to manage risk throughout. As discussed in earlier sections risk is the main area that project management will be focused on. As risk permeates into all 5 key ingredients to a project, which then in turn leads to scope creep or budget overruns.

#### **Execution Phase:**

This is where the project officially gets rolling. Key activities are kickstarted and resources are fully being utilized as much as the scope or nature of work allows. The methodologies defined in the earlier stages are now implemented.

As the progress towards milestones/deliverables is being made, it is imperative that controls are maintained, and continuous evaluation is undertaken against the risk management plan and the budgets that have been set up. This also includes timely progress updates to relevant stakeholders.

Agile methodology dictates that the work is done on iteration basis and there is a level of flexibility to accommodate changes on the go as well as correction of any problems that arise.

#### **Closing Phase:**

This is essentially the sunset stage of the project regardless of whether it was successful or not. The work is closed off and the documentation is finalized. All team members are either reassigned or are free to work on other projects based on their contracts.

One of the key takeaways of this part of the lecture was the review of takeaways, basically the lessons learnt which can be used to make any future projects more likely to be successful. If the project was not a success it is highly advisable to perform a hindsight analysis to look into

what went wrong and why. This has to be documented. This is especially critical if the project failed due to organizational or management shortcomings as such issues will eventually pop up in other areas and/or projects as well.

#### 1.5. Project Organizations

This concept applies to organization which undergo internal projects, as opposed to projects an external party would be doing for your organization. Such organizations are necessary as ongoing projects may disrupt the day-to-day activities; these organizations use resources from within the firm in most cases but ensure that the ongoing projects are managed in a controlled environment without any impact on the main organizational activities.

Broadly, the same concepts apply to project organizations as they do to any external projects. One additional key characteristic of said projects is the cross-functional aspect, it may blur boundaries between business units or even across multiple group entities; there is also a chance that the objectives of the project can have inter-related tasks which then requires resources to be pulled from their respective teams for set periods of time.

#### 1.6. Project Management Techniques

- WBS: Work Breakdown Structure
- GANTT Chart
- Kanban
- Critical Path Method

#### WBS: Work Breakdown Structure

This exercise breaks the project down into sub-components called tasks and subsequently subtasks. This mapping is critical to a controlled delivery of the project, as well as resource and workload management. A set of tasks can be called a milestone, which are key events during the life of an organization where a component of the contract may be delivered. In terms of Agile, this could be an iteration or one section of a functionality that can be tested.

One very key concept here was the concept of work packages. Which are essentially the lowest level in a WBS hierarchy and can consist of lists/demands that a certain task has to meet, a sort of a cover all bases event. In class the example was a subtask for compatibility with earlier versions and then work packages listing out all the versions it was compatible with.

#### Gantt Chart

A Gantt chart is presented as a timeline with activities listed vertically on the left and months listed out horizontally along the top, a typical example is shown below:

## **Gantt Chart**

Task Name	Q12019			Q2 2019	Q3 2019	
Task Name	Jan 19	Feb 19	Mar 19	Apr 19	Jun 19	Jul 19
Planning						
Research						
Design						
Implementation						
Follow up						

#### Figure 5 An example of a Gantt chart

This chart, among other things, achieves the two following key objectives

- It shows a timeline of the whole project and that of the underlying activities, dependencies can be shown here which can have a significant impact on project scheduling. Combining all of these provides a start and end date to a project
- Transparency related to the project in terms of resource management and work scheduling

#### Kanban

Kanban originates from the Just-In-Time inventory management systems and is centered more around consistent ongoing improvement in ongoing projects, the aims are as follows:

Improve Flo	Reduce Leac				Deliver Value
	Towards Lean perations		Predict Opera	tak Iti (	ase bility of ons by g errors

#### Figure 6 Philosophy of Kanban

Kanban at its core is an activity that derives management and leadership from the bottom up, working on the philosophy that the ones closer to base operations are in a better position to identify improvements. The idea here is evolutionary change by keeping up what you are currently doing and everyone identifying areas for improvement as the process goes along.

#### **CPM:** Critical Path Method

CPM at its core is a methodology to control project scheduling before anything else and is extremely useful for large and complex projects. A critical path is a sequence of activities that need to be completed to ensure that the project is fully completed and delivered including accounting for all dependencies. A delay in one task can have a chain affect on other activities and potentially the project as a whole.

It starts off from a WBS diagram which defines the relationships and all dependencies between the tasks that need to be completed. A diagram is then drawn linking all of these tasks and taking into account all dependencies. A task estimation is then made and this is what provides the critical path for said project.

#### 1.7. Synopsis of Learnings

The learnings related to this course within the class were confined to the course based structured learning. The concepts reviewed have provided me a basis of concepts that I was either already applying in my current role or will be learning later on as I pursue my PMP certification. I have never pursued a structured course on Project Management, so it was quite an interesting learning experience.

Following were my key takeaways from this course:

1. Each product line is managed as a its standalone line and an in-house project

- 2. How automation has affected the requirements for the human workforce in different areas of the supply and production lines
- 3. SAP implementation for the Yasar group by Yasar Bilgi as a case study for a successful ERP implementation with little to no prior experience especially when the ERP landscape is riddled with failed go-lives

The takeaways from this course are quite a few from two aspects; one being how Yasar group has been perfecting the art of project management and the second being the importance of this course toward where the world is heading with an expected rise in the requirement of project manager roles later in this decade.

This course delivers a lot of value for me for me from a future perspective. I was able either take away a lot of new learnings or refresh my knowledge on some key concepts related to project management. The course aligns with my field and work responsibilities being both in the field of Project Management and ERP implementations.

The section around Agile and Waterfall was one key component of learning for me considering recent developments around the COVID era as well as with the significantly high rate of failure of ERP implementations. Waterfall is a very useful technique and can pay dividends for significantly high value and long-term projects however, with the advent of IT infrastructure and the requirement of implementation of IT projects Waterfall has been exposed for all its weaknesses.

This is where Agile has found its place in the modern playground of project management and this is something I was able to visualize through the course as well as my research on the Yasar group. The SAP deployment for the whole group is a key example of ERP deployments done right. This also shows why that I need to adopt Agile as I come across more projects that I need to manage as well as pursue certifications in Agile Project Management disciplines.

This SAP deployment has been a very useful case study for me. I am currently working on a similar ERP process implementation and the knowledge is something I intend to employ during the process implantation. While the project that I am working on is not as significant or historical but it holds the same strategic value for the organization and can have key bearings on how the organization's future shapes up.

To close off this part, I will go back to the in-class learnings and touch upon an area that I found to be of significant insight. This would be the concept of project organizations within an entity. Normally the idea of project management is associated with new activities that have never been pursued before whenever one thinks of project management. However, as time passes the discipline of Project Management can also be quite useful for recurring activities in the organization which can pay dividends towards operational efficiency.

## 2. Financial Reporting

#### 2.1. Reasons for Selection

This selection was selected based on two reasons; one being my academic background and the second being the breaktime discussion with Professor Mehmet regarding the prevailing economic situation in Turkey, which was ever evident during our trip and a lot of Turkish people we came across were quite vocal about the recent inflation. It isn't significantly different from what is happening in Pakistan and the prices have sky-rocketed during the year.

When it comes to the course breakup itself, a lot of concepts were more of a revision for me than learning something new. Being an accounting nerd at heart, even if it is no longer my field it was still quite enjoyable sitting in the lecture and seeing the years rolling back to my classes during my ACCA.

#### 2.2. Lecture Structure

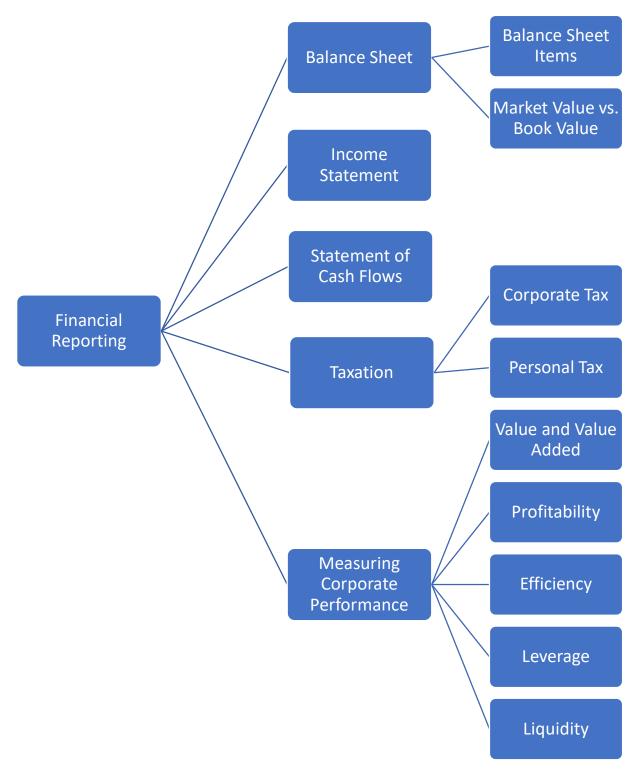


Figure 7 An overview of Financial Reporting and Analysis course structure

#### 2.3. Balance Sheet

A balance sheet shows the value of the firm's assets and liabilities at a particular point in time. The components of the balance sheet and its make up are significant considerations in decisions such as credit worthiness from potential suppliers as well as banks. A balance sheet also shows equity which reflects the shareholders' portion in the business and this equity is a liability for the company as well.

#### Common Size Balance Sheet

A common sized balance sheet is a way of stating/showing the items on a balance sheet where instead of dollar values the portions against each item is shown as a percentage of total assets. As will be discussed in this section later, often ratios or percentages are calculated to find certain percentages, where this balance sheet does away with some part of those calculations as it already shows those values.

#### Market Value vs. Book Value

This is an extremely important accounting convention of how figures stated on the Balance Sheet are estimated as there are quite a few items which either do not have a readily available valuation of whose valuations are subject to change post-acquisition. This is where this consideration comes in since in the cases listed above the book values (value at which an item was acquired) and the market value (value at which the item can be disposed off in the market) may differ. The common convention is to state items at the lower of the two.

#### 2.4. Income Statement

An income statement shows the revenues, expenses, and net income for a firm for a set period of time which could be monthly, quarterly or yearly. The oft used concept which is also one of the indicators of financial health is EBITDA (earnings before interest, tax, depreciation and amortization). The idea behind this is for the figure to show what the company has made from its regular operations before it starts meeting all of its payment commitments to external parties or internal liabilities.

#### 2.5. Statement of Cash Flows

The idea behind statement of cash flows is to reflect how much free cash the firm has, as opposed to the income statement which shows the revenues and expenses when they are incurred the statement of cash flows reflects outflow of cash. The free cash can then be used for either servicing working capital, profit distribution, new investments or R&D projects.

#### 2.6. Taxes

Taxes have impacts on both organizations and individuals, two concepts were discussed during the class:

- Marginal Tax Rate: Tax paid on each dollar of income
- Average Tax Rate: Total tax bill divided by total income

Similar to Pakistan, the corporate tax and individual taxes are implemented on a stepped approach where each range of income is taxed on the range's respective tax rate.

#### 2.7. Measuring Corporate Performance

Under corporate performance assessment multiple aspects and methodologies were discussed including the mathematical formulas use to calculate said values. I will briefly add summaries of all the concepts below:

#### Value Added

- 1. Market Capitalization: This is the value of a company's shares and provides a valid basis for valuation of the company or its market value which can then be used for activities such as mergers and/or acquisitions.
- 2. Market Value Added: This is the market capitalization value but without the book value of its shares/equity which was the value at which the shares were originally issued. This value will show you the level of value the company's activities have generated reflected by shareholder confidence.

#### **Profitability**

- 1. Economic Value Added: It is very simply a company's net income minus its cost of capital. Cost of capital includes the cost to service bank or other loans as well as commitments to shareholders for instance dividends to be paid. This is the cash company has available to invest in activities such as acquisitions or R&D.
- 2. Return on Equity: This is a measure of return generated by the company using the equity injected into the company after all costs of financing are paid for. The formula is net income over equity.
- 3. Return on Assets: This is the return on assets employed. The formula is net income with interest added back as interest is not a cost related to assets.
- 4. Return on Capital: This is the return on the capital injected into the business. Formula is interest plus net income divided by long term debt and equity.

All of the ratios above are a measure of company's profitability shown in different denominations with each denomination showing the efficiency of operations in terms of what was invested and what the returns were. There is no baseline for these ratios and are industry and region specific in most cases.

#### Efficiency

- 1. Asset Turnover Ratio: This ratio reflects the efficiency with which the organization uses its assets to generate sales/revenue. Generally, a higher value is preferred. The calculation is sales divided by total assets; in case the assets have fluctuated over the year significantly an average value can be used as well.
- 2. Inventory Turnover Ratio: This reflects the usage of inventory specifically to service sales. This is also a marker of how quick the company has moved inventory. For one instance, in an industry with quickly moving inventory a lower ratio can indicate issues.

3. Receivable Turnover Ratio: This reflects the level of receivable maintained to service the sales. This would only apply to businesses operating in credit sales. A higher ratio is desirable in most cases for most businesses.

#### Leverage

- 1. Long Term Debt Ratio: This ratio shows the financing split between debt and equity specifically long-term debts. Long term debts are usually cheaper when compared to equity, however, the higher the debt the more restricted an organization can be due to the lender's risk preferences.
- 2. Debt to Equity Ratio: This ratio purely shows the level of debt taken over and whether the organization has higher levels of debt or lower levels when compared to equity.
- 3. Total Debt Ratio: This is a ratio of total liabilities to total assets and the higher it is the riskier an organization is, since the assets are not enough to cover the debt taken on by the company.
- 4. Times Interest Earned: This ratio shows an organization's ability to cover its interest payments from its earnings before interest and tax.
- 5. Cash Coverage Ratio: This ratio is an iteration of times interest earned ratio but reflected in terms of free cash, depreciation is added back which is a non-cash expense.

#### Liquidity

- 1. Net Working Capital to Total Assets: The formula is explained in the name of the ratio. This reflects the level of working capital held/invested as a portion of the total assets held by the company
- 2. Current Ratio: This is the ratio of current assets to current liabilities and shows how much free cash an organization is likely to have. Generally, a higher ratio would be highly preferred.
- 3. Quick Ratio: This ratio takes current ratio but removes the value held in inventory as that is comparatively illiquid when compared to other current assets.
- 4. Cash Ratio: This takes receivables out of quick ratio and compares the most liquid assets to a firm's current liabilities.

#### 2.8. Synopsis of Learnings

The in class learning through the course solely were quite limited as I already have a certification in Finance and have worked in finance in the past for almost three years. Therefore, the learnings were mostly limited to outside classroom learnings in the following key areas:

1. Economic complexities local to Turkey and the current economic state of the country

- 2. Level of inflation and its effect on the Turkish populace
- 3. The effect on foreign funding and entities operating in Turkey due to the recent coup and the current regime
- 4. How Yasar University is financed and the rationale for it to be set up

The first key learning would be the economic struggles of Turkey. During our trip the theme of extremely high inflation was quite evident, everyone from the residents to the shopkeepers and taxi drivers were insisting on higher fares. This was quite a stark contrast to the Turkey of a few years ago which was on its way to becoming a superpower and a NATO member.

During my discussion with the professor, it was evident that the country was struggling, and the struggles were not to dissimilar to that of Pakistan. The international trade had slowed down and the foreign investment had decreased owing to Turkey being a less of a lucrative market now. Quite a few international entities had also scaled back their operations.

The political turbulence of the previous years has also been a significant contributor to the economic slowdown. The levels of employment had seen a significant drop and the crime has increased as a result. The politics seemed to be a hot topic no matter where we went and seemed not too dissimilar to the state of our country. Professor Mehmet was able to shed quite some light on the state of affairs with a financial lens.

Overall, the structure of regulations around reporting and taxation are quite similar between Pakistan and Turkey, this is something that I was surprised to learn as one would think that being in close proximity to Europe, Turkey would more likely follow a European model but that was not the case. Majority of entities prefer to report under the IFRS regulations and the local reporting requirements do not deviate significantly from the IFRS standards.

In terms of taxation, the individuals are taxed on a stepped approach. The higher you earn, the higher your tax rate is expected to be. Marriage was a significant factor towards the tax calculations unlike Pakistan. This is something that was inherently Western in nature, if you are married you get taxed on lower rates and from the in-class activity I could see that the tax break was quite impactful.

Speaking of the corporate tax, that is also loosely based on the corporation's revenues and its nature of activities. Furthermore, a system of sales tax/value added tax is also operating in Turkey which seems to be the norm to ensure that the national exchequer stays afloat during the tax year as well as these running revenues are critical to a nation's wellbeing.

# 3. ENOVA: Entrepreneurship Innovation

#### 3.1. Reasons for Selection

This lecture was delivered as more of a discussion on contemporary issues rather than a structured lecture like the other courses. The idea was to elicit ideas from the class around different subjects that fall under this lecture. This is something I found quite interesting, and I did thoroughly enjoy this lecture.

The second reason is mainly what the idea of this subject entails, which again reconciles quite well with my current role as well as future aspirations. Having set up multiple streams within my company which are now their own revenue generating offerings to external clients and innovating process and solutions that are more time and cost effective for our clients. I consider this something part of my personal brand as well and do aspire towards my own ambitions alongside my current roles.

#### 3.2. Summary of the Lecture

I will not be mapping the structure of this lecture solely because this was a more debate-oriented session as described above. The main themes in this lecture were around entrepreneurship first and foremost. Main idea was the increasing trend of startups and a lot of new graduates opting for pursuing their business ideas no matter how small instead of looking for jobs. This then ties into the impact of innovation when everybody is opting for new business ideas then a lot of new ideas may no longer remain "new".

Going back to the graduates pursuing business ideas, I could not help but sense that this trend is quite common in Pakistan and could observe that this was the same for Turkey as well. As alluded to above Turkey has had its own battles with inflation and a depreciating currency; which has led to decreased disposable incomes, constricting job market and withdrawal of foreign funding and entities. This is something us Pakistanis are already quite familiar with.

In times such as above, when a normal household needs multiple earners, most graduates are not finding gainful employment for years on end. The next area explored was the idea of finding a niche, finding something that is underserved; whether there are no players or the current ones are not fully serving the demand in the market. This is an application of entrepreneurship and innovation. One example discussed here was the idea of opening a café or a fast-food restaurant both of which can be done with minimal investment and overhead.

Building on the idea above, the instructor went around the room asking for ideas where each participant would describe a way they would open a café and differentiate it from what is currently already being done. This was a good exercise and a bit of a departure from the other lectures where the discourse was mostly driven by structured course content.

#### 3.3. Challenges for Women Entrepreneurs

This was also one of the key discussion points and takeaways which I empathize with the most. The last decade has seen a notable rise in Women in positions of leaderships in organizations and the discussions around the gender wage gap being acknowledged as an actual issue. This has been tackled in many ways ranging from mandatory quota seats in state owned entities to publicly listed entities ensuring that their board strata have equal representation as well as the middle management positions being equally divided between genders.

Moving the discussion on from the above another issue was discussed which is now becoming a matter of public discussion and is being highlighted, this issue is the lack of trust and support for women entrepreneurs. Funding and investment are the keys to every start up and entrepreneurial venture. It is common knowledge that a lot of venture capitalists and wealthy investors are middle to late aged men who either hold traditional values or have just been part of a business world which was predominantly men. Said beliefs whether explicitly held or just unrealized biases are significant barriers towards women entrepreneurs seeking investment.

This is unfortunately no uncommon thing that investor confidence is higher for men in positions of leadership versus women. Investors see a lesser chance of success with women in leadership positions in startups and other ventures which leads to either no funding or an extremely risk averse stance towards the funds provided which incidentally then leads to over management of the direction of the venture. Recent times have seen a rise in successful women entrepreneurs supporting budding women led ventures and filling the gap which conventional investors will not fill for whatever reasons.

Regardless of the biasness or the myopic reasons, this issue deserves to be highlighted and acknowledged as an extension to the glass ceiling that women have faced in the business world. Having said all that, as the newer generation replaces the older conventional minded investors this issue will likely start getting lesser starting from the prominent developed markets. The underdeveloped areas will still remain an issue but that is true for many other issues and is unfortunately the way of how the order of things is.

From my own perspective, as the number of women candidates increases in courses at a Masters level and higher this issue will also gain more spotlight and even when we look at general trends the ratio of male to female candidates is starting to tilt in females' favor. This does not merely apply to fields where women are generally more successful but also now to fields which were once male dominated. I think I will highlight Motorsports as an example, this was an example of a male dominated industry both in terms of team or business leadership and actual drivers. There are now examples like the late Sabine Schmitz, Susie Wolff, Claire Williams and Danica Patrick. These names include Team managers, Team owners and successful racing drivers.

#### 3.4. Synopsis of Learnings

For this section, the learnings have for the most part been covered in the write-up above since the discussion was very fruitful, however, I would like to summarize below in terms of key learnings:

1. Entrepreneurial landscape in the country and the impact of the recent inflation on graduates' outlook

- 2. Challenges met by Turkey's recent graduates and their similarities to Pakistani graduates in an inflation ridden landscape
- 3. Challenges faced by women in the workplace and especially in terms of business ventures and financing
- 4. The entrepreneurship principles employed by Yasar group throughout its organic growth
- 5. The commitment to innovation throughout the Yasar group, this is expanded upon in the second deliverable

## 4. Concluding Remarks

To conclude the report above, this trip was a very educative experience both in terms of in class learning as well as social learning and plain tourism. The trip was very well planned and managed in a way that all of the participants could take time out of their work calendar to travel for two weeks. The weather was a bit on the hotter side but overall good enough for visiting different regions.

There are obviously a lot of aspects to such a trip and arrangements to make. Perhaps the biggest one was ensuring that Yasar University and the staff had availability to accommodate the participants due to the general university academic calendar. Furthermore, the second challenge was to ensure if the Pinar Sut plant management was open to allowing an industrial visit. The senior management on site also gave us an overview on the group through a presentation.

Considering the two main areas above, I am thankful to the NUST management in arranging an industrial trip which must have been quite a task. Furthermore, the trip being in a location as scenic as Turkey was a bonus and allowed me to get away from my hectic professional life and enjoy travelling around Turkey.

The social learning and exposure were a critical part of the trip. There was a lot of diversity between the different cities that we visited. Istanbul while a very beautiful city had a lot of tourists, which was to be expected as we were there around the beginning of tourist season. It was a costly place to be but the variety of food on offer and the difference between the Asian and European sides was one of the best experiences. Then there was Izmir where our classes were held, this was a city quite different from Istanbul. The tourist season hadn't quite begun in Izmir so even the main tourist destinations were not significantly crowded. The city was much cheaper than Istanbul and that makes sense with it being a student town. I generally found the people to be nicer as well.

The table below provides a high-level summary of the key learnings during the trip both from a conceptual perspective and a practical perspective.

<b>Conceptual Learning</b>	Practical Learning			
• Project Management and Finance were centered around conceptual learning.	ENOVA was a course designed as an in- class discussion and to allow the participants to discuss their views on Entrepreneurship			
• Different components and methodologies to project management	• Effects of the political scenario on the business market and investor outlook			
• The rise in popularity of Agile methodology and failures of ERP implementations	• Rising inflation and cost of living crisis in the country which is not widely reported/known worldwide			
• Similarity of reporting regulations between Pakistan and Turkey	• A supply chain where you care about suppliers being key to Pinar's success			
• The Taxation system in Turkey and the Western influence	• Development of the Yasar group and its organic growth as an example of entrepreneurship			
• Influence of innovation towards becoming a successful entrepreneur under the course ENOVA	• Live application of successful project management methodologies in the Pinar Sut plant			
• Coming up with innovative ideas to make your venture stand out	• Yasar Bilgi's successful SAP ERP implementation providing a case study of how to manage notoriously difficult projects such as ERP implementations			
• Impact of Socio-economic factors on the rising rate of entrepreneurial ventures and the general tilt between employment vs entrepreneurship	• Implementation of SAP ERP without any prior experience was a prime example of innovation to ensure that the group retained its competitive edge in a time where the Turkish market was			
• Challenges faced by women entrepreneurs. The stereotypes impeding their progress. Lack of investor confidence leading to a lack of funding	<ul> <li>starting to see new entrants</li> <li>The cultural differences in different regions of the country as we moved from Istanbul to central parts of the country</li> </ul>			

Table 2 Summary of course learnings; Practical v Conceptual learning

To expand on the final part of the summary, I will touch upon the academic learnings. First off, Yasar university brought back a bit of nostalgia from my student life days where the only concern and responsibility in the day was to make it to classes on time and then I had the rest of the day to do with as I pleased. Then there are the courses covered themselves. I think the course choice was very smartly done keeping in mind that all participants were from different backgrounds. Some of the courses like Financial Reporting, Business Ethics and Project Management aligned with my background and were helpful either from a refresher or a new knowledge perspective. Others like Quantitative Analysis were more informative other than anything else.

Project Management was perhaps the most beneficial course for me, it aligned with my career direction. Gave me an overview of key concepts in the discipline. Furthermore, I was able to take a deeper dive into the rationale behind why Agile methodologies are the new noise when it comes to Project Management. Yasar group's ERP deployment which I reviewed during the second deliverable was a source of key learning for me as well since I am currently working on an ERP deployment and there are a lot of takeaways to be used from my research.

Financial Reporting and Analysis covered the basic concepts of finance and reporting. The key in-class learning was how the taxation structure works in Turkey both for individuals and corporations. There were some Western influences to be seen in the tax structures such as lower tax brackets for married individuals. In terms of outside-class learning, this was done through observations during the trip and a discussion with the course professor, which helped me understand the state of Turkey's economy and how the socio-political factors have influenced the inflation in the country.

ENOVA was perhaps the most interesting course covering Entrepreneurship and the need of innovation to be a successful entrepreneur, which was covered in more of an in-class discussion manner as opposed to a structured course manner. The discussion was around the entrepreneurial landscape in the country and the effect of the current economic factors on recent graduates. Later on, the discussion was around the challenges faced by women entrepreneurs, the bias they have to put up with and the lower investor confidence in them leading to a lack of investment.

The trip for me was a very positive experience and I would definitely opt for another industrial trip if given the chance before my degree concludes but that is wishful thinking more than anything else.

# 5. Deliverable 2: Analysis of Pinar's supply chain vs. FMCG companies in Pakistan

Other than the academic and social learnings during the Industrial Trip to Turkey, the participants also visited Pinar's dairy processing plant located in Izmir. This was the second main portion of the industrial trip. The industrial visit took place on Wednesday, 3<sup>rd</sup> August 2022 and was arranged by the university themselves.

This visit is what forms the ground for our second deliverable. In place of a supply chain course this industrial visit to Pinar Sut was meant to be a practical overview of how a truly local supply chain is used and how it influences the operational practices of the company. Furthermore, the analysis of supply chain also gave me an overview of ENOVA in practice as to how the principles of entrepreneurship and innovation have been applied to bring the group to where it is today.

Finally, with enough knowledge of Pinar's supply chain under our belt we are expected to compare it to the supply chains employed by the FMCG entities in Pakistan. The basic objective behind this deliverable was to find out what made Pinar so efficient. Was it that the supply chain philosophy was similar to what the global best practices are or whether there is a secret that Pinar and Yasar knew that brought them to where they are with no prior or external knowledge to help them along the way.

## 6. Overview of Yasar Group Structure

The trip was organized in partnership with Yasar University, a part of the Yasar Holding Group, which is one of Turkey's biggest groups with 21 companies covering different industries from food and water processing to Trade and Services. This Group has been operating in Turkey for over 77 years and has a staff of about 7500 people. Four of the Group's entities are in the top 500 companies of Turkey.<sup>1</sup> Here is a graphic showing the group's timeline<sup>2</sup> and how the history ties into the objectives of the project:

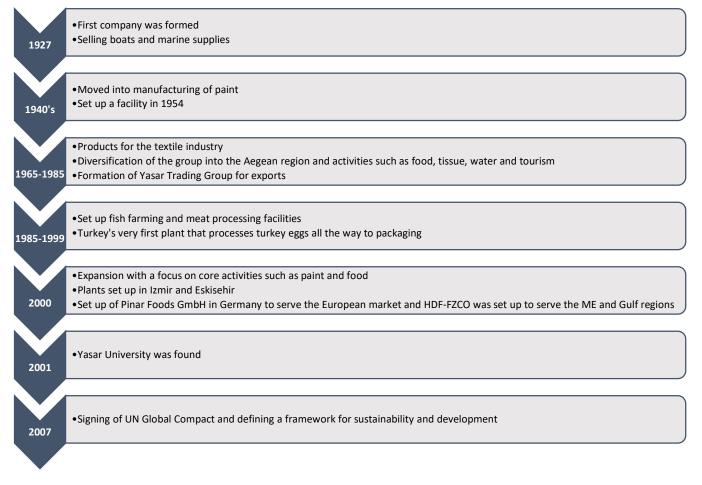


Figure 8 Timeline of key events in Yasar group's history

<sup>&</sup>lt;sup>1</sup> Yasar 2021 sustainability report

<sup>&</sup>lt;sup>2</sup> <u>Timeline | Yaşar Holding (yasar.com.tr)</u>

## 7. Group's influence on the supply chain

To start off the review of the Pinar supply chain, I will first discuss the importance of Yasar group's roots in shaping the structure of Pinar's supply chain, the supply chain and the underlying philosophy for the group and Pinar are intricately linked.

#### 7.1. Place of origin

For at least 5 or more decades, the company was at its heart a Turkish company which was dedicated to serving the country along with the obvious goal of making money. It was set up by a young Turkish man and throughout its growth thrived by serving the underserved areas of the market. Ironically the first company was set up in Rhodes, Greece just a strait away from mainland Turkey.

#### 7.2. Capturing growth opportunities

As of today, the group has diversified into multiple streams of business and not all of them are built off of the areas of core competencies and years of organizational learning. This has been an impressive feature of the company's growth. Initially, they went about capturing the areas which needed serving both in terms of business and the Turkish nation, taking up significant market share which would have otherwise been taken over by other entities especially foreign European countries with close proximity to Europe.

The geographical aspect of the expansion ties into this for a major part as well. The company when it was founded and for quite a few years afterwards was purely regional or rather local. The earlier years were mainly focused on the regions alongside Aegean Sea before the expansion started into the central mainland in areas like Izmir which then resulted in the companies being able to serve areas on the opposite cost.

#### 7.3. Focus on core areas

Even with the group expanding to what is now a holding company turning over \$585m annually the focal products and processes have always been the core areas like food, water, paint and dairy. Three of these elements share an overlapping supply chain in terms of both upstream and downstream processes. The group has over 6 decades of experience in these items as well which has allowed them to develop a significant place in the market as well as processed that are efficient beyond their competitors and this is something I commonly observed with Pinar being the most widespread product during my stay.

## 8. Observations on Pinar's supply chain

Under Pinar specifically within Turkey there are 3 main companies and/or separate offerings:

1. Pinar Sut

This is the Pinar dairy company that was established in Izmir in 1973, and this is the plan we visited during our Industrial Trip.

2. Pinar Et

This is the meat processing company and is one of the biggest meat processing facilities of Turkey. This was not under the purview of our trip.

3. Pinar Su

Su stands for water and is the arm that supplies bottled water throughout Turkey. This was also not in purview of our trip. Pinar Su was the first company to provide bottled drinking water in Turkey.

Pinar Sut has three main facilities also acting as distribution centers for downstream entities:

- 1. Izmir
- 2. Eskisehir
- 3. Sanliurfa

The upstream collaborations consist of 358 entities with 144 of them being supplier farms. There are about 20,000 individual producers. The company is committed to serving its farms and producers. The core component of the Pinar supply chain is sourcing locally promoting local businesses and keeping costs low.

The plant that we visited operates on a six-sigma production model, we visited different sections of the plant which included both processing sections as well as packaging sections and the utmost focus was on product cleanliness and hygiene.

One important fact of that shapes the current supply chain of Pinar is the voluntary involvement in the CDP climate change program. This has led to requirements regulating the type of suppliers and Pinar also investing in ensuring that said suppliers qualify for the program.

#### 8.1. Digitization and ENOVA

Pinar Sut itself is focusing on the core function of dairy processing, packaging and distribution. However, the company is also leveraging the abilities of other group companies to obtain digitization and automation capabilities.

Yasar Bilgi A.S. is the information technology arm of the group and is committed to providing cloud based digital software solutions to internal companies as well. <sup>3</sup> Currently the focus is on Robotic Process Automation where the process of support functions are being automated using AI based robots leading to lower overheads.

We observed the automation process in action as well during our visit to the packaging sections of the plant and it was interesting to see most of the sections operating with only 2-3 employees

<sup>&</sup>lt;sup>3</sup> Yasar Group Sustainability Report 2021

overseeing the machines to ensure that there were no breakdowns but the actual manual work being done was significantly less that one could expect to observe.

During my research on this section and the group's overall digitization philosophy, I could clearly see innovation at play exhibiting the reasons why Yasar and Pinar have always been ahead of the curve. The fact that they are constantly looking for avenues to make their operations more efficient and now looking at robotic automation is a very good example of how innovation can make a business more sustainable over long term.

The commitment to constant innovation at group level is indicated by the importance of Yasar Bilgi A.S. and its influence on the group. Yasar Bilgi A.S. was the first company to introduce SAP to Turkey and have even recently delivered on a massive SAP project named ASTRON. In the section of supply chain systems, I have gone into more detail as to why SAP is a key strength for any company in the FMCG industry and in terms of innovation that was an extremely timely and critical decision to move the group over to SAP when they did.

### 8.2. Supplier Vetting

Pinar and by extension Yasar group operates on a policy of growing with its business partners. The following areas are area of consideration while selecting new suppliers and business partners:



Figure 9 Points of emphasis for supplier selection by Pinar

The suppliers must sign the Pinar Supplier Principles Guide which ensures compliance with all relevant procedures under the sections above. One of the group companies DYO Boya ensures that compliance with regulations like environmental, legal and UN Global Compact.

The Pinar companies have their own Quality Assurance teams which are responsible for carrying out audits and ensure adherence to the evaluation and approval system. Through 2021 Pinar Sut carried out audits of its suppliers to ensure that health and safety standards were up

to code. The time during COVID brought about changes and the audits in 2021 were necessary as the climate had changed and when the world opened back up it was the time to ensure that the suppliers were upholding previous standards and ensuring compliance of new introductions into the industry.

For certain smaller suppliers who do not have the capability to present their own statistics, Pinar has been working to measure their carbon footprint. When it comes to Pinar Sut there are two areas to consider when it comes to suppliers; one is the raw milk providers and second is all of the suppliers excluding milk producers.

Pinar Sut supports the milk producers to ensure that they can comply with European standards. Other than raw materials, Pinar worked with 1850 suppliers in 2021 that complied with the Pinar standards criteria.<sup>4</sup> Environmental impact is something that is given the most consideration and priority is given to suppliers that are in close proximity to the locations and having TS EN ISO 14001 certifications for service procurement.

Pinar Sut is also part of a initiative called Business call to action programme (BCtA) in which the company has pledged to train small scale milk farmers out of rural areas in Turkey. This also includes women farmers. The advantages to this go both ways, one it makes the Pinar supply chain much more efficient as there is less wastage and the output is increased, on the other end of the spectrum it also ensures that it lifts rural area farmers out of poverty by essentially turning their farms into small scale businesses.

#### 8.3. ERP/Infrastructure Deployed

As with all other areas, Pinar is also very highly integrated with the Yasar group in terms of digital supply chain infrastructure. The group's IT and infrastructure arm is managed by Yasar Bilgi which was set up in 1983. In 1996 Yasar Bilgi started the country's biggest ERP transformation project by bringing the whole group onto SAP, the transition began in 1997 and concluded in 2004. Yasar Bilgi then went to use this experience to sell SAP implementation services to external customers as well.

I will now go into a little more experience on why SAP is the best platform to manage and leverage the strengths of an FMCG company the size of Pinar. Generally, majority of the global household entities use SAP for the following reasons:

<sup>&</sup>lt;sup>4</sup> Yasar 2021 Sustainability Report

#### Built-in state of the art process to support Production and FMCG operations

- Opportunities for Automation and integration of Third Party Logistics
- Objects exist at the highest level to ensure scalability and avoid the need for data duplication for each entity
- System/Client wide processing capabilites to ensure quick decision making
- Industry leading demand planning and forecasting capabilities within user defined strategic parameters

#### Extensive Partner agreements with entities in each region

- Ensuring easy access to consultancy and customization in every area for Transnational entities
- Strong offshore implementation support
- Cost effective support in remote areas

#### Integration with SAP products and SAP development partners

- Availability of solutions not available in the core system offerings
- APIs to integrate external systems to ensure two way data flow
- Hassle free integration of approved third party products without significant implementation cost in the form of off the shelf offerings

#### Sales and Distribution as a completely integrated offering on top of the supply chain processes

• Procurement and sourcing highly integrated into the existing functionalities

• Automation opportunities and availability of standard documentation to cut down on admin overhead

#### Figure 10 Unique selling points of SAP with respect to FMCG industry

Here are the main areas which are of significant use to Pinar in managing their supply chain over and above the ones described above:

- 1. Master Data residing at client level
- 2. Business Partner management at client level
- 3. Locations and Warehouse

#### Master Data Management

Within SAP, the product master data resides at client level. Any product that is set up is set up at a client (system wide level) which is then available to use throughout all entities and locations available in the system. Enabling a product for a new location/entity is an exercise that takes merely 30 seconds. All entities can use a different valuation and different units of measurement. This has been significantly useful for entities like Yasar and Pinar where new locations may need to be set up.

#### Business Partner Management

Similar to Master Data, Business Partners also reside at a client level and can be used to create relationships as well as Supplier and Customer accounts where one business partner can be used across all entities in the system, again with minimal time requirement when adding a new entity. For a group such as Yasar and with more than 2200 partners, some of which may be common between entities this is a very useful feature. This makes it easier to track data through the system across multiple entities.

#### Locations and Warehouses

One of SAP's most useful features is its stock/inventory management, which is supported by a robust process which can support first, second, and third party logistics and fulfillment, as well as support for outbound and inbound logistics. This process can be integrated with production

planning, MRP as well as external APIs which support FMCGs such as bar code readers and scanners which automatically adjust/consume inventory at the point of dispatch/sale.

A single entity can have multiple locations, warehouses and shelves all manageable within SAP. With minimal changes to the system, date of manufacture and expiry can be managed which ensures minimal stock loss. Then there is also the capability to manage stock in multiple denominations such as crates, boxes, cartons and even containers.

# 9. How do FMCG companies in Pakistan compare

One of Pinar's strengths is that it is purely dependent on the local produce and supports the local economy and contributes to the uplifting of rural area farmers. Like Pinar, there are multiple entities in Pakistan that operate on quite a similar business model due to cheaper resources and production overheads.

A comparison in necessary to look further into what makes Pinar a standout performer in Turkey all the while being a Turkish company at heart with no foreign roots. To that end one significant difference is that majority of the entities operating in Pakistan are foreign owned and have decided to enter the market here due to significantly lower costs and in some cases due to Pakistan having less stringent regulations. The following analysis is meant to investigate if this difference has any key bearings.

#### 9.1. Philip Morris (PM) International

In terms of its upstream supply chain, Philip Morris' model is quite like that of Pinar. The sourcing is all done locally from farms in different regions of Pakistan. As touched on above, Pakistan provides an excellent market for the sale of its products and additionally locally sourced and manufactured products are cheaper which leads to profitable exports. Finally, regulations in Pakistan do not levy any excessive taxes on industries such as tobacco.

Coming to the point of supply chain, Philip Morris has developed relationships with its farmers in Pakistan. Sustainability of its farming practices is of utmost importance to PM, therefore the company has a program to provide training and technical assistance to farmers. This as expected ensures that the crops can be sustained year on year as well as retaining a high level of output per farm.

The second key area is the robust logistics network both in terms of inbound and outbound logistics. The company uses all available means of transportation to bring the farmed goods inwards as the tobacco farms are in Punjab, Sindh and KPK. Cigarettes are a very popular product in Pakistan, the pricing is low which means that members of all classes have the buying power and with the distribution systems being efficient the company ensures that the product is available to everyone who wants to buy it even if they are in a very remote or under-developed area.

#### PMI's Supply Chain System

Similar to Yasar Group and Pinar. The parent company of Philip Morris Pakistan also uses SAP as its ERP software. The rationale for SAP's use is very similar to that of what was described above with Pinar. In terms of purely Supply Chain, Planning and logistics no other ERP has the appropriate processing might or objects to support supply chains of this magnitude.

The foremost key areas for PMI would be the farm locations and their processing facilities as their own locations with storage groups and areas for each type of product. Furthermore, the system has an array of units of measurements and conversions can be defined which ensure that the stock held in one area can be converted to a different unit of measurement once the locations change.

Expanding on the points already made, another useful feature for PMI is the integration of Supply Chain with logistics and distribution systems which ensure that any goods once moved from one warehouse to another can be correctly accounted for. With the Warehouse Task facility the company can also correctly account for goods in transit in the system to show that no site shows inflated stock prematurely.

Finally, with the data unified in one system and products across multiple locations using the same product codes the company can make decisions with a wide country wide strategic view of the data which is all being managed in real time.

#### 9.2. Unilever Pakistan

The broader theme of a global company operating in Pakistan for lower manufacturing costs and a larger local market as well as export opportunities continues to apply in this case as well. I will keep my write up limited as the case is quite similar to that of PMI in terms of inbound and outbound logistics. Unilever's products are available country wide as well, regardless of the location. They are priced in such a way that they appeal to the members of lower and middle classes.

#### Unilever's Supply Chain System

Unilever also uses SAP for its supply chain systems and the company as a whole is quite integrated with having recently moved to the newer cloud-based S/4 HANA platform, Unilever is fully leveraging the system's capabilities. Since Unilever has a much bigger portfolio of products, along with products the Business Partner management system is a quite useful feature for the company as well.

As an addition to the above, Unilever also utilizes the capabilities of SAP's Human Capital Management module which is Success Factors. Unilever has a very high workforce in Pakistan and is distributed across multiple locations and SF has been quite useful in retaining talent. This plays very well into the HR strategy of the company since Unilever places a lot of value in its hiring, developing and retention systems.

## **10. Side by side comparison: Pinar/Yasar and Pakistani FMCGs**

Table 3 A comparison	of supply c	hains Pinar v	Unilever &	Philip Morris
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Pinar	Pakistani FMCGs			
Supply chain is comprised of local	<ul> <li>Supply chain is comprised of local</li> </ul>			
suppliers	suppliers			
• Majority of vendors are local farms	• Majority of vendors are local farms			
• The company operates a program to train and empower farmers to ensure higher product outputs	• The company operates a similar program to help train farmers to ensure better crops/inputs			
• Farms in very close vicinity to each plant are preferred	• Efficient transport systems ensure that farms can be placed in areas with more fertile land regardless of vicinity to plant			
• Non-farm suppliers have an edge if they are closer to the facilities	<ul> <li>Non-farm suppliers' location does not have a bearing during selection</li> </ul>			
• Emphasis is on ensuring a lean				
transport model to lower transport cost and a supplier base closer to facilities	• An emphasis on having a very efficient transport model to ensure a wider supplier network			
• Use of SAP to ensure an effective				
supply chain management system	• Similar use of SAP to ensure they can leverage the system's strengths			
• No foreign expertise, however, the				
group boasts significant expertise in the food and beverages industry	• Significant expertise in operations due to existence in multiple global locations			
• Can leverage the strengths of the Yasar group's wide portfolio of companies	<ul> <li>No expertise beyond the FMCG products on offer as this is the core business line</li> </ul>			
• Focus on products centered on milk and its derivatives requiring lower	business line			
processing hence the product portfolio for Pinar Sut is fairly streamlined	• Similar model for PMI as the products are centered around Tobacco and its derivatives whereas for Unilever, the product portfolio is significantly vast and covers products consumed in different aspects of life			

## **11.** Conclusion

To conclude this part of the project, I see a lot of similarities between the FMCG entities operating in Pakistan and Pinar. The operating model and the platforms being leveraged are quite similar with one significant difference. Yasar started very much a local company and it still is at heart and is on its way to becoming a global entity whereas majority of the FMCG entities in Pakistan are global and started their operations in Pakistan after finding success elsewhere and brought FMCG best practice models to their operations here.

Yasar and by extension Pinar grew organically and were very much self-sufficient on their way to where they are now. They have had quite the journey with a history of learning along the way, using the group's existing capabilities they have formed synergies along the way. The group now has a company operating in every industry and ensures that internal Yasar entities can also leverage this expertise. This web of readily available expertise has been the reason of success behind Yasar and Pinar's success and it is useful to mention that Yasar group still considers food and beverages at the heart of its business.

In terms of key decisions along the way, choice of a SCM system will always be a key decision for a volume intensive FMCG business. Yasar and Pinar made the same correct decision that majority of the other big name FMCG companies make. Other than PMI and Unilever, BAT, Pepsi, Coca Cola etc. all use SAP as well and this has been extremely helpful for Pinar as well.

There is a value that is offered by SAP that other systems can just not match. That is the system already comes with best practices in a lot of areas built in and more often than not it is useful for entities to adopt those best practices since they have been successful for many other businesses over the years instead of allocating costly resources and exposing themselves to risk in forming new process which could eventually not work as efficiently or not at all and with this much volume at stake, even two days of unaccounted for inventory can result in millions of losses since FMCG businesses will always be about the stock they hold and how quickly they are able to move it out the door.