

predictive models.

## Discussion 5.1: Applying Predictive Models to Different Industries [15—20 Minutes]

### Learning Outcome Addressed:

- Formulate predictive questions for different industries.

***\*This is a required discussion and will count toward course completion.***

You are the manager of a fast-food franchise that sells various types of burgers, and your goal is to improve the performance of your restaurant. Formulate two or three predictive questions you

could ask (e.g., will [this] lead to [that])? Keep in mind that the answers to your predictive questions should aim to help in improving business goals.

Next, apply this level of thinking to your own industry/organization. What are one or two predictive questions you could pose that would improve your business?

Read the statements posted by your peers. Engage with them by responding with thoughtful comments and questions to deepen the discussion.

**Suggested Time: 15-20 minutes**

Rubric: Discussion 5.1

Criteria	Exceeds expectations	Meets expectations	Below expectations
Thoughtful and complete response to the question(s)	<b>4 pts</b> Fully responds to the question(s), post is supported by connections to the reading and real-life examples, and post makes additional connections to the field of data engineering with novel ideas, critical thinking, or extensive application of how to use the topic in future work.	<b>3 pts</b> Fully responds to the question(s), and post is supported by connections to the content or real-life examples.	<b>0 pts</b> Partially responds to the question(s), or connections to the content are missing or vague.
Engagement with the learning community	<b>2 pts</b> Posts thoughtful questions or novel ideas to multiple peers that generate new ideas and group discussion.	<b>1.5 pts</b> Asks questions or posts thoughtful responses to generate a single peer's response.	<b>0 pts</b> No responses to peers or posts minimal or vague responses to peers that do not motivate a response (e.g., "I agree.").

Unread



✓ Subscribed

[← Reply](#)**Diego Milanés (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/228518>)

Apr 24, 2024

Predictive questions

- Will setting up a home-delivery system improve sales?
- During which time of the day should I hire more personnel to improve the customer experience and increase sales?
- Should I buy better-quality products to engage more customers with high-quality burgers, hoping to increase sales, or will this only increase the production cost? (quality over quantity)
- Will building a gourmet top-notch restaurant within the franchise, targeting a different segment of customers, show better performance than regular restaurants?

Predictive questions in my business (education)

- Will the creation of levelling courses reduce the desertion rates at the university?
- Can the use of organizational apps improve a student's academic performance?
- Does using audio-visual (and even virtual) teaching resources produce the same academic and intellectual impact on a student as the regular teaching methods?

[← Reply](#) **Manjari Vellanki** (<https://classroom.emeritus.org/courses/9054/users/231480>)

Apr 24, 2024

Hi Diego-

Great post!

I was little confused while preparing the questionnaire by considering "Manager" role. The fourth question "Will building a gourmet top-notch restaurant within the franchise, targeting a different segment of customers, show better performance than regular restaurants?" falls under manager radar to improve performance ?

[← Reply](#)

**Diego Milanes (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/228518>)

Apr 26, 2024

Hi Manjari,

Maybe not the manager of one restaurant, but maybe within the definition of region manager (as it is a franchise).

cheers

[← Reply](#) **Manjari Vellanki** (<https://classroom.emeritus.org/courses/9054/users/231480>)

Apr 26, 2024

Got it!

[← Reply](#) **Haitham Farag** (<https://classroom.emeritus.org/courses/9054/users/233864>)

Apr 25, 2024

Good day Diego

Your application of the requirement to the education context is very interesting, particularly the effectiveness of the various teaching methods. In your experience would the course nature (theoretical, practical application...etc) be considered as an independent variable in the model?

regards

Edited by **Haitham Farag** (<https://classroom.emeritus.org/courses/9054/users/233864>) on Apr 25 at 9:33am[← Reply](#) **Diego Milanes (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/228518>)

Apr 26, 2024

Hi Haitham,

I think so. The way the subjects are treated (theoretical, experimental, computational, etc.) does impact the student, and the student's performance might vary greatly

depending on this. For instance, good theoreticians are not always good experimentalists.

cheers

← Reply 👍



**Yossr Hammad** (<https://classroom.emeritus.org/courses/9054/users/229118>)

Apr 25, 2024

great post and interesting questions in your education field.

← Reply 👍



**Javier Di** (<https://classroom.emeritus.org/courses/9054/users/226884>)

May 2, 2024

Very detailed and thoughtful layout Diego. I would look if the home delivery system is not cannibalizing in store sales and if the overall pie is or not growing. Not sure there is a way to measure something as qualitative as "customer experience" to drive sales?

The better quality products I guess has to be experimented and tested? Not sure about another way to do it?

← Reply 👍



**Swati Sharma** (<https://classroom.emeritus.org/courses/9054/users/236938>)

May 6, 2024

hello Diego: Your questions are really smart! They're all about making things better for your fast-food place and your school. Like, figuring out if delivering food to people's homes will make more money, or if using cool apps can help students learn better. Thank you for sharing!

← Reply 👍



**Manjari Vellanki** (<https://classroom.emeritus.org/courses/9054/users/231480>)

Apr 24, 2024

If I'm the manager of fast-food franchise, my predictive questions to improve performance of restaurant are:

1. Does the current menu meet all customer requirements, or any change is required to enhance customer satisfaction?

Result: Possible change in menu.

2. Does the staff need any additional training on additional skills or to improve sales?

Result: Assigning additional training when needed.

3. The Percentage of money spending currently on marketing is giving good results?

Result: Chance of rise or shrink in amount spending on advertising.


The possible questions that I can ask in my current organization would be like this:

1. How many patients may be available and eligible for a clinical trial?

Result: To optimize the number of subjects enrolling in the study.

2. What is the chance of early termination?

Result: helps in patient retention

← Reply  (1 like)



**Haitham Farag** (<https://classroom.emeritus.org/courses/9054/users/233864>)

Apr 25, 2024

Clearly stating the potential result of each question is a very good practice for the assessment to stay grounded and relevant to the objective, and not turn into a wish list!

Thanks Manjari, for the reminder to include *Results*.

Edited by **Haitham Farag** (<https://classroom.emeritus.org/courses/9054/users/233864>) on Apr 25 at 10am

← Reply 



**Manjari Vellanki** (<https://classroom.emeritus.org/courses/9054/users/231480>)

Apr 25, 2024

Thanks Haitham :)

← Reply 👍



**Yossr Hammad** (<https://classroom.emeritus.org/courses/9054/users/229118>)

Apr 25, 2024

great post. Including the results justified all the predictive questions.

← Reply 👍



**Manjari Vellanki** (<https://classroom.emeritus.org/courses/9054/users/231480>)

Apr 25, 2024

Thanks Yossr :)

← Reply 👍



**Diego Milanes (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/228518>)

Apr 26, 2024

Hi Manjari,

Thank you for your post. Regarding your very last poin, is the 'chance of early termination', independent variable or is that probability what you would like to forecast?

cheers

← Reply 👍



**Manjari Vellanki** (<https://classroom.emeritus.org/courses/9054/users/231480>)

Apr 26, 2024

Hi Diego-

It is the variable which holds the Patient current status info .

Thanks,

Manjari

← Reply 👍



**Mariana Flores** (<https://classroom.emeritus.org/courses/9054/users/237198>)

Apr 30, 2024

Hi Manjari, so nice to connect on the discussion board again. Great post, especially around the predictive question regarding employee training and sales. Would be great to be able to quantify the linear relationship between fiscal or time investment in employee training and sales, especially forecast and understand from a financial perspective how this relationship impacts the fast-food franchise bottom-line.

Predictive analysis leveraging linear regression is fascinating - thank you for sharing interesting questions where data science and analytics can be applied.

← Reply 👍



**Manjari Vellanki** (<https://classroom.emeritus.org/courses/9054/users/231480>)

Apr 30, 2024

Hi Marina-

Thanks for going through my post and sharing your feedback :)

← Reply 👍



**Javier Di** (<https://classroom.emeritus.org/courses/9054/users/226884>)

May 2, 2024

Great layout and thoughtful Manjari. I don't know though how you can measure if the menu meets all customer requirements and if that would enhance satisfaction without testing it? Same with if the staff needs any additional training to improve sales?



← Reply 👍



**Yossr Hammad** (<https://classroom.emeritus.org/courses/9054/users/229118>)

Apr 24, 2024

### Fast food Business goal:

- increase sales which drive to revenue growth.
- Enhance the client's experience and increase their loyalty.

### Predictive questions:

- How will optimizing the kitchen operations (like reduce preparation time) impact customer's waiting time and increase satisfaction?
- How introducing a new product ( such as plant based burger or halal burgers) will affect the sales and increase revenues?
- How will implementing a new express drive -thru lane during peak hours increase customer satisfaction ?

Now as a financial analyst.

### Business Goal:

Optimizing workforce management and cost effectiveness strategies.

### Predictive questions:

- How will investing in the employees training programs affect skills, job satisfaction and in general the employees performance?
- Will increase bonus for high performance employees reduce the turnover costs?
- How implementing flexible work arrangement will affect the employees productivity and satisfaction?

← Reply 👍 (1 like)



**Mariana Flores** (<https://classroom.emeritus.org/courses/9054/users/237198>)

Apr 30, 2024

Hi Yossr, so nice to connect on the discussion board again. Great post, especially around the predictive question regarding investment in employee training and job satisfaction. Would be great to be able to quantify the linear relationship between investment in training and job satisfaction especially forecast and understand from a financial perspective how this relationship impacts business bottom-line. For example, something like, for every dollar in investment in employee training job satisfaction increases/decrease by X value leading to +/- \$Y.

Hypothesis testing leveraging predictive analysis via linear regression is fascinating - thank you for sharing about your industry and interesting questions where data science and analytics can be applied.

← Reply 👍 (1 like)



**Javier Di** (<https://classroom.emeritus.org/courses/9054/users/226884>)

May 2, 2024

Hi Yossr, you raised some interesting ideas that are well explained. My question would be how can you test these ideas without spending money to experiment/try them out and learn from the data afterwards?

← Reply 👍



**Chris Cosmas (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/226607>)

May 2, 2024

Very important second question in you industry perspective. A company I worked for earlier had big issues with turnover, I saw at least 3 generations of colleagues in two years. It is a very important matter which needs to be addressed in companies, as alot of knowledge is lost, it makes everyone loose time, line managers who need to work with HR employees to find new suitable employees, colleagues who must pick up some extra activities to not fall behind on company KPIs. Overall it is a strain on all the organisation and should be prioritized.

← Reply 👍

[https://](https://classroom.emeritus.org/courses/9054/users/225803)**Roman Jazmin** (<https://classroom.emeritus.org/courses/9054/users/225803>)

Apr 25, 2024



There are 3 predictive questions that I will ask myself if I want to improve your burger business. They are (1) "Which promotional ads will generate the most burger sales to more people?", (2) "Which location is best to promote to a large traffic of burger customers?", and (3) "What time of the day is the best time to prepare burgers to more customers to lead to more sales?"

Using this same level of thinking for my company, I would ask 2 predictive questions to improve company revenues? The first question would be, "Which of my existing services are most of my clients asking for the most that allow me to stop or cancel useless services so that I can save on operational cost?", and (2) "What is the latest trends or services that most customers in my industry is focusing or demanding for so that I can retool my com[any to meet more client needs and expectations?"

[← Reply](#)

○

**STEPHEN HUTSON** (<https://classroom.emeritus.org/courses/9054/users/233645>)

May 1, 2024



Really liked your thinking for your own company here Roman! I think both looking at removing services that aren't in high demand, as well as adapting to the current market needs are an effective way to try and adapt the services you provide to be more marketable to customers, and by reducing the overall services provided will allow you to do better on what's currently in demand

[← Reply](#)

○

[https://](https://classroom.emeritus.org/courses/9054/users/233864)**Haitham Farag** (<https://classroom.emeritus.org/courses/9054/users/233864>)

Apr 25, 2024



Business Fast-food franchise (selling various types of burgers)

Goal Improve the performance of your restaurant

Predictive Question	Result
In the period between Jun-1 to Sep-1	which

will introducing a burger promo of 2 for the price of 1 increase burger sales (target 20% profit increase ) ?	<ul style="list-style-type: none"> <li>◦ bank Holiday and long weekends</li> <li>◦ burgers types</li> <li>◦ locations</li> </ul>
To what degree will a menu promotion affect the needed stock level of fries ( promo runs 10 days every month)	the stock level at each warehouse
<p>Before Jun-1,</p> <p>When are the best days to upgrade (replace) the key kitchen appliances (e.g. frier, milkshake machine, grill) based on</p> <p>-the number of hours required to upgrade (replace) each unit</p> <p>- the time of day is not a factor (e.g. if the restaurant works 24/7 can the units be installed any time of the day)</p>	<ul style="list-style-type: none"> <li>◦ Time and day.date to install in each of the desired locations</li> </ul>

### Application to NGO

Goal Increase donations and better manage first responders' contingency stocks.

Predictive Question	Result
During the Lenten fundraising campaign  to what degree will increasing the number of street fundraising pairs/teams increase donations	periods and locations with the highest potential  number of teams and probable raised funds plot (at $p=95\%$ )
What stock level of hygiene kits and water filters are needed during the East Asia cyclone season	Fill-rate and stock-level plot (at $p=95\%$ )

Edited by [Haitham Farag \(https://classroom.emeritus.org/courses/9054/users/233864\)](https://classroom.emeritus.org/courses/9054/users/233864) on May 1 at 7:19pm

← Reply 🍷 (1 like)

○



[Ricardo Anaya \(https://classroom.emeritus.org/courses/9054/users/228915\)](https://classroom.emeritus.org/courses/9054/users/228915)

⋮

Apr 29, 2024

great, like the specifics on the dates, adding a new menu items it also tied to temporary events

I like your reponse, as I focus on menu , staff, and seeing your response made me wonder that I missed inventory, thanks

← Reply 👍 (1 like)



<https://classroom.emeritus.org/courses/9054/users/237198>

Apr 25, 2024

As a manager of a fast-food franchise that sells various types of burgers, my goal being to improve the performance of my restaurant, I would ask the following predictive questions:

- Is there a predictive relationship between number of promotions (independent variable) and number of total items sold (dependent variable)?
- Is there a predictive relationship between total number of different types of burgers on the menu (independent variable) and total sales (dependent variable)?
- Is there a predictive relationship between number of marketing retargeting efforts (independent variable) and total sales (dependent variable)? (Could also compare to other marketing tactics.)

As a data science & analytics consultant partnering with business owners across various industries, I pose some of the following predictive questions that aim to improve their business:

- Is there are predictive relationship between number of website visits (independent variable) and total sales (dependent variable)?
- Is there a predictive relationship between number of orders with free shipping (independent variable) and total number of items sold per order (dependent variable)? (Could also compare to total items sold per order without free shipping.)

← Reply 👍



<https://classroom.emeritus.org/courses/9054/users/229165>

Apr 27, 2024

Hi Mariana,

I like the question related to the relationship between the free shipping and sales quantity. Does this questions focus on hitting a minimum sales amount to trigger free shipping? or

does it focus on having periodic free-shipping promotions across the board?

Thank you.

Best,

Turki

← Reply 👍



**Mariana Flores** (<https://classroom.emeritus.org/courses/9054/users/237198>)

Apr 30, 2024

Hi Turki, so nice to connect on the discussion board again. Free shipping and number of items per order is one of my favorite predictive questions, too. Great question - the focus is on periodic free shipping promotions across the board (with no minimum amount of sales required) as free shipping is one of the most important reasons customers make an online purchase.

Most consumers are willing to purchase more items or higher priced items to qualify for free shipping. Thus, free shipping promotions with a minimum sales amount may affect total number of orders (when not able to qualify for the promotion and opt out of an online purchase) and total number of items per order (purchasing more items to qualify for the promotion). From a statistical perspective, the former may lead to confounding bias while the latter to endogeneity.

Depending on the business objective, it may make sense to apply certain promotional requirements to attain specific goals. For example, periodic free shipping promotions to convert prospects to consumers or promotions with a minimum sales amount to trigger free shipping to consumers for repurchase purposes.

← Reply 👍



**Dawn Prewett** (<https://classroom.emeritus.org/courses/9054/users/233112>)

Apr 28, 2024

Your first question for your own industry initially had me answering, "well of course", the more people that visit a site, surely the more sales you'll have. However, I quickly reversed course as I've worked on websites where this was not the case. We were getting a lot of hits, but dismal sales and our number of visitors was slowly decreasing. This was a sign that something was terribly wrong and it took us some time to track down the issue. I wonder if a predictive model could have helped us identify the issue sooner as well.

 [Reply](#) **Mariana Flores** (<https://classroom.emeritus.org/courses/9054/users/237198>)

Apr 30, 2024

Hi Dawn, so nice to connect on the discussion board again. Same here - I also originally assumed visits would lead to sales which reminds me it's always good practice to validate assumptions via hypothesis testing ;) Qualifying Best Linear Unbiased Estimator (BLUE) conditions were met, perhaps forecasting sales based on number of website visitations could have helped to compare predicted vs. actual sales figures to understand the gap (if any). As well as examine visit per visit marginal utility on sales. By hits do you mean number of visitations or visitors? If you don't mind me asking, what did you encounter in tracking down the issue?

 [Reply](#) **Dawn Prewett** (<https://classroom.emeritus.org/courses/9054/users/233112>)

Apr 30, 2024

Yes, hits refers to visits. It was some time ago and I can't actually recall what the issue was. I just remember trying to figure out what was going on and having very little to work with. I want to say this went down before Amazon was really a household name yet and analytics definitely weren't what they are today. I was the web developer, not because I knew what I was doing, but because I didn't care that I didn't know and was just willing to dive in. So, tracking down the issue was really quite the feat and now I really wish I could remember what on earth it was that was wrong.

 [Reply](#) **Mariana Flores** (<https://classroom.emeritus.org/courses/9054/users/237198>)

Apr 30, 2024

Go Dawn! Being a Developer at Amazon must have been such a remarkable experience. Curiosity is one of the most sought-after soft skills in Data Science & Analytics. All to say, major kudos! :)

 [Reply](#) 



**Dawn Prewett** (<https://classroom.emeritus.org/courses/9054/users/233112>)

May 1, 2024



When I was a web dev it was at a tiny company and Amazon wasn't really popular yet. I actually wasn't a software developer at Amazon until 2020 and was laid off in 2023. It was a remarkable and wild experience - though definitely not for the faint of heart. It all turned out okay though, now I get to combine data and programming on a daily basis, which I love. But that love of learning and willingness to dive in even when I have zero clue is what got me in to Amazon to begin with. Always be excited when you don't know the answer because that is where adventures begin.

← Reply 👍



**Roy Nunez** (<https://classroom.emeritus.org/courses/9054/users/229552>)

Apr 26, 2024



### **Predictive questions I would ask as a manager of a fast-food franchise :**

1. Will implementing dynamic pricing strategies during peak and off-peak hours affect average transaction frequency and value and customer foot traffic volume?

- Independent Variables: Pricing strategies (dynamic pricing during peak and off-peak hours).
- Dependent Variables: Average transaction frequency and value, customer foot traffic volume.

2. What is the impact of promotional offers on sales and revenue during different times of the year?

- Independent Variables: Promotional offers, time of the year.
- Dependent Variables: Sales, revenue.

3. What are the optimal staff hours that will improve service, speed and customer satisfaction?

- independent Variables: Staffing hours.
- Dependent Variables: Service speed, customer satisfaction.



**Predictive questions I would ask as a manager of a banking software development team :**

1. Will integrating advanced analytics on our distributed microservice architecture increase performance and SLAs (Service Level Agreements)?
  - Independent Variables: Integration of advanced analytics into microservice architecture.
  - Dependent Variables: Client satisfaction, client retention.
2. How much value to customer retention and marketing will revamping services to have real time processing with clickstream data add?
  - Independent Variables: Revamping services to include real-time processing with clickstream data.
  - Dependent Variables: Value added to customer retention, marketing effectiveness.
3. Can predictive analytics help forecast system load and resource utilization to optimize cloud resource scaling and cost management on AWS?
  - Independent Variables: Use of predictive analytics for system load and resource utilization forecasting.
  - Dependent Variables: Optimization of cloud resource scaling, cost management.

**Predictive questions I would ask as a tech lead pushing forward a transactions machine learning initiative:**

1. Will enhancements in digital tools based on the preferences of the Tech-Savvy, Young Customers cluster lead to increased engagement and retention rates within this group?
  - Independent Variables: Enhancements in digital tools tailored to the preferences of the Tech-Savvy, Young Customers.
  - Dependent Variables: Engagement rates, retention rates within this customer cluster.
2. Will creating targeted marketing campaigns for each customer cluster increase the conversion rates for new product offerings and services?
  - Independent Variables: Targeted marketing campaigns for each customer cluster.
  - Dependent Variables: Conversion rates for new product offerings and services.
3. Will proactive credit and product offers based on cluster-specific profiles improve financial product uptake?
  - Independent Variables: Proactive credit and product offers that are tailored based on cluster-specific profiles.

- Dependent Variables: Financial product uptake

← Reply 



**Turki Alghusoon** (<https://classroom.emeritus.org/courses/9054/users/229165>)

Apr 27, 2024

Hi Roy,

Great real-life examples! the questions you propose go the heart of business objectives in many organizations. I wanted to learn more about how you envision measuring the impact of the predictive questions around new initiatives (e.g. integrating advanced analytics, enhancement in digital tools):

- Do you plan on having a control group and measure the improvements against that control group? or do you plan on measuring improvement against a set performance target?

Thank you.

Best,

Turki

← Reply 



**Roy Nunez** (<https://classroom.emeritus.org/courses/9054/users/229552>)

Apr 30, 2024

Hi Turki,

Great question! With A/B testing we can test with control groups. There is a new initiative to enhance tracking on some flows from end to end and enhance the reconciliation pattern using real time processing. The advanced analytics will be used to help guide the upcoming digital tools introduced and we can measure accordingly.

← Reply 



**Turki Alghusoon** (<https://classroom.emeritus.org/courses/9054/users/229165>)

Apr 27, 2024

For my fast-food franchise (Turki's Beef), I would be keen on increasing sales. In particular, I would like to know the following:

- **Customer Satisfaction:** is there a predictive relationship between dollars invested in staff training program and higher customer satisfaction scores?
  - **Decision:** adjust training program budget.
- **Location:** is there a predictive relationship between restaurant locations and increased traffic to my restaurant?
  - **Decision:** change strategy for choosing locations.
- **Promotions:** Will having robust promotional campaigns allow me to sell higher volumes during off-peaks hours?
  - **Decision:** modify promotions during off-peak hours.

Applying the same thought process to my own industry (International development), I would like to know how certain policies/decisions would impact the development outcomes in developing countries. Although the answers will be probably more complicated, I would like to know the following:

- Is there a predictive relationship between the percentage of green investments and socioeconomic improvements in client countries?
  - **Decision:** adjust the percentage of green investments in countries' portfolios.
- Is there a predictive relationship between prioritizing Development Policy Financing (DPF) loans to countries experiencing fragility, conflict, and violence (FCV) and level of stability in those countries?
  - **Decision:** adjust the number of DPF loans in FCV countries.
- Will the utilization of satellite imaging provide increased assurance on the progress of development projects in remote locations or FCV countries?
  - **Decision:** increase/decrease investment in standing up satellite imaging capabilities in oversight functions.

Edited by [Turki Alghusoon \(https://classroom.emeritus.org/courses/9054/users/229165\)](https://classroom.emeritus.org/courses/9054/users/229165) on Apr 27 at 4:58pm

← Reply 



[Dawn Prewett \(https://classroom.emeritus.org/courses/9054/users/233112\)](https://classroom.emeritus.org/courses/9054/users/233112)

Apr 28, 2024

The questions regarding your own industry are thought provoking. I'm curious what each of the outcome of each of these would be, not just because these are interesting questions, but important ones. These are questions that, when answered could help

improve the lives of many individual in struggling countries. Fantastic questions that truly provoke thought. Thank you for sharing.

← Reply 👍 (1 like)



**Ricardo Anaya** (<https://classroom.emeritus.org/courses/9054/users/228915>)

Apr 29, 2024

I agree proviking questions

reading responses widens your visibility, as now this response included traffic to the restaurant, Which I did not include

other response added inventory

and I think also on this food time (expiration dates) woudl also be something to consider as a variable.

← Reply 👍



**Chris Cosmas (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/226607>)

May 2, 2024

Very creative name Turki :D,

I like the parameters you have chosen, a bit more out of the box with staff development and traffic data. Not all should be based on product, there are other ways of providing value.

As for your industry questions, it seems like a very interesting field. There has been recent scandals in regard to grants and loans ending up in the wrong hands I think that's the biggest issue with providing loans to unstable countries. It come from a very good intention which I fully support but due to the receiving end's instability there always seems to be money disappearing.

← Reply 👍



**Dawn Prewett** (<https://classroom.emeritus.org/courses/9054/users/233112>)

Apr 28, 2024


Fast food franchise seeking to improve the performance of of the location:

1. Will decreasing burger prices increase total sales revenue?
2. Will an expanded selection of menu options lead to a more diverse customer demographic?
3. Will hiring more staff lead to increased customer satisfaction scores?

Corporate audit team seeking to improve the efficacy of the auditing program by improving program compliance:

1. Will increasing the frequency of audits lead to improved compliance rates at the program level?
2. Will increasing the number of auditors improve our understanding of what leads to program non-compliance?
3. Will extending audit times to allow for relationship building result in shorter program resolution times?

Edited by **Dawn Prewett** (<https://classroom.emeritus.org/courses/9054/users/233112>) on Apr 28 at 6:46am

← **Reply**  (2 likes)

○



**Lee Lanzafame** (<https://classroom.emeritus.org/courses/9054/users/231975>)

Apr 29, 2024

⋮

i feel like companies all ask similar questions, i wonder if google AutoML will soon solve for this.

← **Reply** 

○



**Dawn Prewett** (<https://classroom.emeritus.org/courses/9054/users/233112>)

Apr 30, 2024

⋮

Most likely, but then I'd think it would be on us to come up with more novel questions.

← **Reply** 

○



**Yossr Hammad** (<https://classroom.emeritus.org/courses/9054/users/229118>)

Apr 29, 2024

⋮

Interesting question for the auditing team.

do you think the longer audit time to build relationship is healthy for the auditing team.

I had a colleague worked as an auditor and was complaining about the discrepancy happened when they built relationship .. Sure this wont be the case in every business but what would be the risk percentage that a discrepancy happens ? just curious :)

← Reply 👍



**Dawn Prewett** (<https://classroom.emeritus.org/courses/9054/users/233112>)

Apr 30, 2024

Yossr, good question. Do I think building relationships is healthy for the auditing team - it depends. We're not regulators, if we were then the answer would be a clear no. We are literally going in to help identify issues before they cause impact. We're a line of defense, so if we can build relationships around that, I posit that we could actually be more impactful. However, as with any relationship, there should be boundaries. While it is unlikely that we will ever test this theory, it is one that while brainstorming I was considering.

← Reply 👍 (1 like)



**Priscilla Annor-Gyamfi** (<https://classroom.emeritus.org/courses/9054/users/226376>)

Apr 30, 2024

Great submission Dawn. I would also add that, will have series of training for staff especially auditors improve the quality of service rendered by audit team?

← Reply 👍



**Dawn Prewett** (<https://classroom.emeritus.org/courses/9054/users/233112>)

Apr 30, 2024

We do have regular trainings and frequently talk about how to provide purposeful and meaningful information back to the teams we work with. Honestly, my team is amazing and does a fantastic job with our customers - even when the customers get prickly.

← Reply 👍



**Lee Lanzafame** (<https://classroom.emeritus.org/courses/9054/users/231975>)

Apr 29, 2024

As a fast food manager...

- Will adding a kids toy increase the amount customers spend?
- Will staying open on a Thursday night increase our sales?

As a telecommunications manager...

- Will adding 5g reduce customer churn in regional Australia?
- Will tailored ad campaigns increase sales?

← Reply



**Ricardo Anaya** (<https://classroom.emeritus.org/courses/9054/users/228915>)

Apr 29, 2024

a kids toy and/ or kids area, perhaps adding TV?

adding music, live music?

← Reply



**Roy Nunez** (<https://classroom.emeritus.org/courses/9054/users/229552>)

Apr 30, 2024

Hi Lee,

Thank you for sharing your post! Customer churn reduction with 5G adoption seems like a good hypothesis to prove since many providers in Australia have claimed high levels of coverage throughout the country already. Almost feels like 5 G adoption is a necessary to stay competitive. Will be good to prove that.

← Reply



As a fast-food franchise manager, here are a few predictive questions i would ask to improve the restaurant's performance:

- **“Will introducing a new burger to the restaurant menu items list increase overall sales?”**
  - Analyzing historical data and customer preferences, We can predict whether adding a new burger to the menu will attract more customers and increase revenue.
  - We need to Consider factors like taste, combo, pricing, and uniqueness.
  
- **“Will optimizing the drive-thru experience and process lead to higher customer satisfaction?”**
  - An efficient drive-thru service can significantly impact customer experience.
  - We can use Predictive analysis to determine if:
    1. reducing wait times,
    2. improving order accuracy
    3. enhancing staff training
    4. adding a second drive thru line
    5. Adding a self pick-up
    6. Adding an app based ordering system
  - Any of those actions will positively affect customer satisfaction scores?
  - We would need to Analyze data to predict the potential ROI of such actions.
  
- **“Will running a limited-time promotion on a specific burger out of the menu item, on a specific category can drive repeat business?”**
  - Use predictive modeling to assess the impact of promotions.
  - For instance, offering a discount on a specific burger, such a gourmet or kids, for a week might attract new customers and encourage existing ones to return.
  - We would need to Analyze data to predict the potential ROI of such promotions.
  
- **“Will running a limited-time promotion on a specific burger category matching a calendar specific event drive repeat business?”**



- Again Use predictive modeling to assess the impact of promotions This time adding specific calendar items, For instance, offering a discount on low carb burgers for a week within the fitness month, or local sport team season, might attract new customers and encourage existing ones to return.
- Again, we would need to Analyze data to predict the potential ROI of such promotions.

○ **Within my organization, this are the questions i would ask:**

○ **We need a full data base of frequencies :**

- bands around the world , per country and carrier, with technology usage (2G/3G/4G/5G)
- we have bands and combinations per product
- we need customer actual implementation
- we need possible new bands in discussion by international organizations and upcoming spectrum auctions
- all this to determine what products and combinations of SoC and RFEE can apply to worldwide product, region and local
- this can be achieved udiunh predictive modeling to assess the impact of adding new bands
- prepare de design of new products for the evolution of 5G as it is comming

← Reply 



**Priscilla Annor-Gyamfi** (<https://classroom.emeritus.org/courses/9054/users/226376>)

Apr 30, 2024

Great post Ricardo. I like your submission on the restaurant example but I would love to know the prediction questions you would ask given the conditions you have listed and how that could potentially drive the performance of your organization.

← Reply 



**Chris Cosmas (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/226607>)

Apr 29, 2024


1) Fast Food Franchise:

### Possible questions to improve the performance of the restaurant:

- Will increasing the marketing budget by 25% lead to an increase in sales in the next month?
- Will decreasing the number of food items on the menu lead to lower costs?
- Will operating an extra hour in the night lead to more sales?

### 2) Industry-specific:

- Will Non-Performing Loans decrease if the Interbank lending rate is decreased by 1%?
- Will financial services exports decrease if the local currency appreciates against the EURO?

← Reply  (1 like)



**Roy Nunez** (<https://classroom.emeritus.org/courses/9054/users/229552>)

Apr 30, 2024

Hi Chris,

Thanks for sharing your post! Curious about your second example

Does historical data support this assumption of decreasing non-performing loans when interest rates are decreased? Just thinking about how long the impacts of interest rates take to affect the economy, and how the observable effects would be measured, especially in the midst of other internal or broader economic factors.

← Reply 



**Chris Cosmas (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/226607>)

May 2, 2024

Hello Roy,

You are completely right, it might take too much time to see the effects of the rate decrease.

In general Banks tend to make a margin on the rate they use with the central bank (or the cost of money) and the loan rate given to customers. It might be true that declining rates might provide more affordable loans which in turn might increase the number of

people who take out loans and as a product have more Non-Performing-Loans than before as people rush to borrow money. But on the long term easier borrowing should translate to more business expansion which also translates to more jobs and a more stable source of income for repaying loans.

Of course this is a much deeper topic and would need much more studies than I currently have :D.

But thank you for your comment!

← Reply 👍



**Roy Nunez** (<https://classroom.emeritus.org/courses/9054/users/229552>)

May 7, 2024

Hi Chris,

Thanks for clearing that up. I do agree that easier borrowing should translate to more business expansion. I guess the stock market tends to agree with this too. One can just observe stock price actions when the interest rate are announced to go down :D

← ([https://classroom.emeritus.org/courses/9054/discussion\\_topics/394397?module\\_item\\_id=1506983#](https://classroom.emeritus.org/courses/9054/discussion_topics/394397?module_item_id=1506983#))

← Reply 👍



**Jignesh Dalal** (<https://classroom.emeritus.org/courses/9054/users/229173>)

May 1, 2024

Your questions effectively target key operational and financial levers. For the fast food franchise, exploring the impact of marketing spend, menu simplification, and extended hours on sales and costs is practical and insightful. For the industry-specific queries, examining the effects of interbank lending rates on non-performing loans, and the impact of currency appreciation on financial exports, tackles broader economic factors. These analyses could yield strategic insights for optimizing both operational efficiencies and financial outcomes. Excellent approach to linking business decisions with measurable outcomes.

← Reply 👍 (1 like)

**Koffi Henri Charles Koffi** (<https://classroom.emeritus.org/courses/9054/users/208039>)

May 7, 2024

hi Chris , is there any previous study , or any data that support the idea of 25% budget increase ?

same question for 1% decrease

← Reply

**Priscilla Annor-Gyamfi** (<https://classroom.emeritus.org/courses/9054/users/226376>)

Apr 30, 2024

Three predictive questions I would ask to improve the performance of my restaurant.

1. Will improving the user interface across our app and website, coupled with exclusive discounts, drive increased user engagement and retention rates?
2. Could the introduction of drive-thru lanes for customer orders at all our locations enhance both customer experience and sales performance?
3. Will offering a special discount for students on Fridays lead to increased sales and profitability at our campus locations?

Two predictive questions I would ask to improve the performance of my Beaded Accessories Business.

1. Will improving the user interface on our website, coupled with exclusive discounts, drive increased user engagement and retention rates?
2. Will offering a special discount for women on special occasions like mother's day and International women's day lead to increased sales?

← Reply (1 like)

**Jignesh Dalal** (<https://classroom.emeritus.org/courses/9054/users/229173>)

May 1, 2024

Your predictive questions are well-targeted for both businesses. For the restaurant, consider including traffic patterns for drive-thru effectiveness and varying product popularity on discount impacts at campus locations. For the accessories business, analyze

how UI improvements affect different customer segments and evaluate the long-term impact of occasion-specific discounts on customer loyalty. Enhancing your questions with these variables could provide deeper insights and more actionable outcomes. Great work overall!

← Reply 👍



**Jignesh Dalal** (<https://classroom.emeritus.org/courses/9054/users/229173>)

May 1, 2024

As a manager of a fast-food franchise, aiming to improving the performance of restaurant involves understanding of various factors that can impact sales, customer satisfaction, and operational efficiency.

### Let's try to understand predictive questions:

1. How does the time of day impact sales volume?
  1. Analyzing the data across the day, peak and low time of sales will help with optimizing staff and inventory management. Ensuring efficient operations and customer satisfaction during rush hours.
2. What is the effect of promotional campaigns on sales figures for specific burger types?
  1. Accessing the impact of marketing promotions on sales of specific burger types shares an insights into customers preference and effectiveness of different marketing strategy.

### Dependent and Independent Variable in terms of Linear regression.

For above predictive questions, here are independent and independent variables list.

1. Time of day and sales volumes
  1. Dependent variable: Sales volume (number of burgers sold)
  2. Independent variables:
    1. Time of day(Morning, Afternoon, Evening)
    2. Day of the week (Weekdays, Weekends)
    3. Special events or holidays( event day or other days)
2. Impact of promotional campaign on sales
  1. Dependent variable: Sales volume (number of specific burgers sold)
  2. Independent variables:
    1. Presence of a promotional campaign (campaign active or not)
    2. Type of promotion
    3. Duration of the campaign.

Above insights can then be used to make informed decisions about operational efficiency and marketing strategies to improving business goals.

## 2nd Part of Assignment :

Next, apply this level of thinking to your own industry/organization. What are one or two predictive questions you could pose that would improve your business?

As a **quality assurance manager of a telecommunication company**, focusing on **regression and progression testing for a web application**, predictive questions can help understand **anticipate potential issues**, how the application **affects user experience and performance**.

1. **Will implementation of new feature increase the load time of the web application?**
  1. Dependent variable: Load time of web application (continuous, measured in seconds)
  2. Independent variables:
    1. Implementation of new feature (binary, 0 = no, 1 = yes)
    2. Size of the new feature( continuous or measured in megabytes)
    3. Number of concurrent users (continuous)
2. **Does the frequency of code deployment affect the number of critical bugs reported?**
  1. Dependent variable
  2. Independent variables:
    1. Frequency of deployments (continuous, measured as number of deployment per day/month)
    2. Complexity of change (continuous, rated as low or high)
    3. Testing coverage (continuous, percentage of codebase tested)

This question aims to predict the impact of development practices and new features on **application performance and stability**. Understanding these relationship can **guide decision about deployment schedule, feature deployment, and resource allocation for testing**. Ultimately, improving the quality and user experience of the web application.

← Reply 



**Ahmad Abu Baker** (<https://classroom.emeritus.org/courses/9054/users/234460>)

May 1, 2024

Hi Jignesh,

Thanks for your insightful discussion on using predictive questions in both fast-food management and telecommunications. I appreciate your detailed breakdown of dependent

and independent variables for each scenario.

**For the fast-food industry:** Your analysis of sales volumes impacted by time of day is intriguing. Have you considered adding weather conditions as an independent variable? Weather can significantly influence dining choices. Also, analyzing competitor promotions during your campaign periods might deepen your insights into marketing effectiveness.

**For telecommunications:** Your approach to predicting the impact of new features on application performance is very thoughtful. Could integrating user feedback help refine these predictions further? Additionally, considering historical bug data might enhance your model's accuracy in forecasting critical bugs.

These predictive analytics strategies could provide valuable insights. I look forward to exchanging more ideas and learning from the outcomes.

Best regards,

Ahmad Baker

← Reply 👍

○



<https://classroom.emeritus.org/courses/9054/users/234460>

May 1, 2024

⋮

Hello everyone,

In this discussion, I'm focusing on harnessing predictive questions to optimize performance and strategic decision-making within two distinct sectors: the fast-food industry and business consulting.

### **For the Burger Fast-Food Franchise:**

#### **1. Will introducing a seasonal burger special increase average customer spend during low-demand months?**

- This question aims to explore whether offering limited-time menu items can create enough excitement to boost sales during typically slower periods.

#### **2. Will deploying targeted digital marketing campaigns in the local area increase foot traffic to the restaurant?**

- By analyzing the effectiveness of geographically focused marketing, we can assess if such strategies lead to measurable increases in customer visits.

### 3. Will implementing an online order and pickup system reduce average wait times and improve customer satisfaction scores?

- This operational enhancement might streamline processes and enhance customer experience, potentially increasing repeat visits.

#### Applying This to Business Consulting at EY:

### 1. Will the integration of predictive analytics into client financial assessments lead to more accurate forecasts and client satisfaction?

- This question looks to evaluate whether advanced analytical tools can improve the precision of financial predictions, adding value to client engagements.

### 2. Will introducing a flexible work model improve consultant productivity and client project outcomes?

- Here, we aim to determine if more flexible working conditions correlate with higher productivity levels and better results in client projects.

I look forward to reading your thoughts and insights on these predictive questions. How do you apply predictive analytics in your industry? Are there specific tools or methodologies you've found effective? Moreover, if you have tackled similar challenges, sharing your experiences or outcomes could greatly enrich our discussion and learning.

Looking forward to a fruitful exchange!

Best regards,

Ahmad Baker

← Reply 👍

○



**STEPHEN HUTSON** (<https://classroom.emeritus.org/courses/9054/users/233645>)

May 1, 2024

⋮

As the manager of a local fast food franchise, I would look at the following questions as potential performance improving measures to consider implementing:

1. Would changing our hours to operate more with late-night service lead to increased sales and profitability?
2. Would signing up for a delivery service like doordash or uber eats lead to increased sales and profitability?



3. Would enrolling our employees in additional training programs increase employee retainment and increase customer experience?

In my own industry, i've always wondered if implementing a 4 day work week with 10 hour days would lead to an increase in the employee morale and ultimately employee retention? And would this have an impact on our client's experience?

← Reply 👍



**Isabella Tockman** (<https://classroom.emeritus.org/courses/9054/users/207395>)

May 14, 2024

Hi Stephen,

you first question is very good, staying open later could definitely boost sales, especially in areas with late-night workers who often struggle to find food options after 10 PM or midnight.

And taking in consideration the 4-day work week, I believe many employees would likely appreciate a longer weekend, which could improve morale and reduce turnover. Happier employees tend to provide better service, which could also positively impact your clients' experience.

← Reply 👍



**Javier Di** (<https://classroom.emeritus.org/courses/9054/users/226884>)

May 2, 2024

### **Predictive Questions that would improve performance of fast food restaurant:**

1) Will reducing burger prices (independent variable) lead to more sales (dependent variable) ?

**Possible solution:** Adjust prices

2) Will offering combos of burgers, fries and sodas at lower prices (independent variable) lead to more sales (dependent variable) ?

**Possible solution:** Offer more combos on the menu

3) Will operating later hours (independent variable) after 10pm EST lead to more sales

(dependent variable)?

**Possible solution:** Extend hours of operation

Next, apply this level of thinking to your own industry/organization.

**What are one or two predictive questions you could pose that would improve your business?**

**Predictive Questions that would improve my business:**

- Will offering lower fees (independent variable) to customers for asset management raise (dependent variable) more money or less money?

**Possible solution:** lower fees

- Will lowering the volatility of returns (independent variable within control) raise more money (dependent variable) and make the business more successful?

**Possible solution:** lower volatility of returns

Edited by **Javier Di** (<https://classroom.emeritus.org/courses/9054/users/226884>) on May 2 at 1:07am

← Reply 

○



**Todd Engle** (<https://classroom.emeritus.org/courses/9054/users/228910>)

May 2, 2024

⋮

Here are two predictive questions that could improve a fast-food franchise's performance:

**Question One:** Will offering combo meals that combine frequently purchased items (e.g., burger, fries, drink) at a discounted price increase overall revenue and average order value?

This is something the industry already does today, and the question targets upselling and combo meal optimization. By analyzing past sales data, I could identify frequently purchased items together and predict the impact of bundling them at a discount. This could lead to increased customer satisfaction (convenience) and potentially higher revenue due to the perceived value of the combo.

**Question Two:** Will launching a loyalty program that rewards frequent customers with free menu items or discounts lead to higher customer retention and repeat visits?

I see this a lot in other industries, but not much in the food industry. The question looks at customer loyalty and purchase habits. By analyzing customer purchase data, I could predict if

a loyalty program entices customers to return more often. I could also design the program based on factors like frequency of visits or total amount spent to target high-value customers.

### Quality 1 Plumbing – Campbell, CA

I have a friend who owns a plumbing business and we started talking about predictive modeling. He was curious. He came over because a client had canceled, and he had time to kill before going home. We talked about how this happens often and sometimes he has time left in the day for other unplanned activities. This is what we came up with.

The two predictive questions we came up with:

**Question One:** Will offering same-day appointment slots for a premium price attract new customers who are willing to pay more for faster service and increase overall revenue?

This question explores the possibility of premium service tiers. Analyzing appointment data and customer wait times can help predict if customers would pay extra for quicker service, especially for urgent repairs. This can improve customer satisfaction and potentially increase revenue.

**Question Two:** Can we predict customer churn (cancellations) based on service history or demographics to develop targeted customer retention campaigns?

This question looks at identifying customers at risk of leaving. We might predict which customers are less likely to return for future services by analyzing past service data and customer demographics. This allows for proactive customer retention efforts like targeted discounts or service reminders.

Edited by **Todd Engle** (<https://classroom.emeritus.org/courses/9054/users/228910>) on May 2 at 11:14pm

← Reply 

○



**Swati Sharma** (<https://classroom.emeritus.org/courses/9054/users/236938>)

May 6, 2024

⋮

Hello All: My thought to the first question about 2-3 predictive questions to improve the overall sales:

1. By extending afternoon hours, would that increase the sales and customer traffic?
2. By increasing the Vegetarian options more in the menu, would the sales increase ?

3. By developing an app which will help the customer order online and helps to reduce the wait time. would that drive more orders and sales?

One or two predictive questions that would improve your business:

1. Would Introducing healthier meal options would drive more sales and brand's perception?
2. Will implementing a loyalty rewards program lead to increased customer retention and higher average order value?

← Reply 👍



**Mhelissa Yayalar** (<https://classroom.emeritus.org/courses/9054/users/233590>)

May 7, 2024

Hi Swati,

Your fast-food question #2 is very pointed outcome. Specifically, although fast-food restaurants should be offering various food options to accommodate the diversity of their customer-based, I think rather than being specific to inquiring about 'vegetarian' option, we should ask, "by introducing new food item into the menu, would the sales increase? Presumably, this question would trigger analysis of the market trends in terms of what fast-food consumers are buying. Which will then allow us consider if we should also introduce those popular items.

Thoughts?

-my

← Reply 👍



**Shahrod Hemassi (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/224267>)

May 8, 2024

Hi Swati. I like your ideas for the burger restaurant. I had not thought about changing the hours of operation or adding to the burger options by adding a vegetarian option, but both predictive questions are good ones to propose and it is easy to think that they could prove to be profitable. I especially like your idea of developing an app to make the customer's experience better and seeing if that leads to increased revenue and profits.

Thanks for the interesting post!

← Reply 👍



**Mhelissa Yayalar** (<https://classroom.emeritus.org/courses/9054/users/233590>)

May 7, 2024



I think considering the independent variables (customer demands and supply chain) that goes into the improving the performance, the dependent variable, of a fast-food restaurant, the following questions might be applicable:

1. Customer Demand Prediction:

- Which food item is underperforming from the menu or does not meet customer satisfaction?
- By analyzing historical data on customer preferences, seasonal trends, and promotional campaigns, we can predict the impact of removing food items from the menu. If the prediction suggests positive outcomes, we can proceed with the removal.

2. Supply Chain Logistics:

- Which vendor is underperforming from their commitments (e.g., sourcing ingredients, adjusting inventory levels) improve inventory levels?
- By analyzing supply chain data, we can identify bottlenecks, reduce wastage, and ensure timely availability of ingredients. Predictive models can help us optimize inventory levels and minimize costs.

And with regards to my organization, specifically for airplane sales,

1. Lead Conversion Prediction:

- Will a personalized follow-up strategy (based on lead characteristics and interactions) increase the likelihood of converting potential buyers into actual customers?
- By analyzing historical data on leads, their interactions with sales representatives, and conversion rates, we can build a predictive model. This model can guide sales teams on prioritizing leads and tailoring their approach.

2. Market Trends Forecasting:

- Will monitoring market trends (e.g., economic conditions, fuel prices, technological advancements) allow us to adjust our sales growth strategies proactively?

- By analyzing external factors and their impact on airplane sales, we can create predictive models. These models can help us anticipate market shifts and adapt our pricing, marketing, and product offerings accordingly.

← Reply 



**Koffi Henri Charles Koffi** (<https://classroom.emeritus.org/courses/9054/users/208039>)

May 7, 2024

### Questions

1. advertising the burger will it improve the sale?
2. giving a promotional will increase the customer daily purchase?
3. adding more menu to the existing one will it attract lot of customer ?

for business:

1. introducing training program as a point will increase employee performance?
2. grouping the employee base on their competences and distribute the work base on employee competence will it increase employee 's productivity?

Edited by **Koffi Henri Charles Koffi** (<https://classroom.emeritus.org/courses/9054/users/208039>) on May 7 at 2:37am

← Reply 



**Shahrod Hemassi (He/Him)** (<https://classroom.emeritus.org/courses/9054/users/224267>)

May 8, 2024

If I was managing a fast-food franchise that sells various types of burgers, and my goal is to improve the performance of my restaurant, I would formulate the following predictive questions:

**Question One:** Will offering a kid's meal at a discounted price increase overall revenue and average money spent by each customer?

We already see this at McDonald's with the Happy Meal. And a lot of marketing is done to kids to get them to ask their parents to take them to McDonald's. Parents like that it is an easy and fast food option that makes their kids happy and does not cost too much. But it is a good

predictive question in managing a fast-food burger joint....would offering a kid's meal result in increased overall revenue as well as increase in the average money spent by each customer.

**Question Two:** Would offering a frequent guest reward program result in increased revenue over a period of time?

Again, we can look at McDonald's as an example of a fast-food burger joint which has taken this approach with their Monopoly game that they run on occasion. Guests are enticed by the chance at winning some large prizes based on entries that they receive each time they buy something at McDonald's. This likely brings some guests back to the restaurant chain more frequently due to the hope of winning a big prize.

Now, I will propose a couple predictive questions that could apply to an industry that I'm interested in working with, which is sports gambling. In sports gambling, you want to entice the customers to bet. It does not matter which bet they are making, you just want them to bet. The reason is that the gambling service gets a small percentage of all bets by setting the betting line appropriately so that when an even amount is bet on each side of a choice, an amount will go to the betting service. So as long as you have people betting, you are very likely to earn profits for the company that is providing the betting service. So, if the goal is to entice new customers to bet with your service, and to entice existing customers to bet more, a couple predictive questions could be:

**Question One:** If we offered a free bet to new customers, would that lead to an increase in our monthly profits.

This is an interesting question, because if the customer wins the bet, then the betting service has lost money. But the betting service is gambling (pun intended) on the customer coming back to the betting service to bet more and to use their own money in the future. It increases their customer base which also open up some other revenue streams such as advertising revenue.

**Question Two:** If we offered a higher guaranteed payout when a group of 10 or more friends bet on the Super Bowl this year, would this result in an increase in our overall profits versus profits from previous Super Bowls?

This is again an interesting question because we are offering a reduction in the percentage of the bets that goes to the betting service and in turn, an increase in the percentage going to the customer. But we have a requirement that at least 10 customers are pooled together to bet. So with the potential for a larger collective amount being bet, the betting service could make more money using this promotion.

[← Reply](#) **Isabella Tockman** (<https://classroom.emeritus.org/courses/9054/users/207395>)

May 14, 2024



You are the manager of a fast-food franchise that sells various types of burgers, and your goal is to improve the performance of your restaurant. Formulate two or three predictive questions you could ask (e.g., will [this] lead to [that])? Keep in mind that the answers to your predictive questions should aim to help in improving business goals.

1. Will offering special prices between 11:30 AM and 2:30 PM lead to an increase in lunchtime sales during weekdays?

- Goal: To determine if promotional pricing can boost customer traffic and sales during lunchtime, which is typically a peak period for fast-food restaurants.

2. Will pairing a burger with a beer at happy hour drive more customers to the restaurant during the evening?

- Goal: To assess whether creating combo deals that include alcoholic beverages can attract more customers during off-peak hours.

Next, apply this level of thinking to your own industry/organization. What are one or two predictive questions you could pose that would improve your business?

1. Will implementing a safety training program lead to a reduction in workplace accidents and associated costs?

- Goal: To assess if investing in comprehensive safety training can decrease the number of workplace accidents, thus reducing insurance costs, and legal liabilities.

[← Reply](#) **Timothy Andrew Ramkissoon** (<https://classroom.emeritus.org/courses/9054/users/226697>)

May 18, 2024



Hi Isabella,

I like the idea of special prices/discounts during peak hours; however, pairing alcohol with burgers for a fast-food place may attract a different clientele. Fast food places are typically



catered towards families, so your suggestion would be interesting to determine if the business should change its clientele or if it can attract both.

As for your business, I would also suggest the question: "Will conducting regular risk assessments and safety audits lead to improved safety records and compliance with industry standards?". If you can determine workplace risks and their criticality, you would then be able to develop your safety training program, or even determine if it would be necessary.

← Reply 👍



<https://classroom.emeritus.org/courses/9054/users/226697>

May 18, 2024

Fast Food Franchise Manager

1. Will launching a **social media marketing campaign featuring limited-time offers and promotions (independent variable)** increase **brand engagement and drive higher foot traffic (dependent variable)** to the restaurant?

**Possible Solution:** Execute a targeted social media marketing campaign with attractive offers. Track metrics on brand engagement and foot traffic to evaluate the campaign's success.

2. Does offering a **customizable burger option (independent variable)** where customers can select their ingredients result in higher **customer satisfaction and repeat business (dependent variable)**?

**Possible solution:** Introduce a customizable burger option and gather feedback through surveys. Monitor repeat business metrics to gauge customer satisfaction.

3. Will providing meal deals targeted at families, such as **family-sized burger packs (independent variable)**, increase **average transaction values during dinner hours (dependent variable)** ?

**Possible solution:** Offer family-sized burger packs during dinner hours and analyze transaction values before and after the introduction to assess impact.

Asset Integrity Program Manager

1. Does **using advanced sensor technology (independent variable)** for real-time monitoring of equipment integrity decrease the **likelihood of unexpected failures and extend the life of**

**assets (dependent variable)?**

**Possible solution:** Install advanced sensors for real-time monitoring and analyze the data to predict and prevent failures. Evaluate the frequency of unexpected failures and asset longevity over time.

2. Will **integrating machine learning algorithms for predictive analytics (independent variable)** improve the **accuracy of failure predictions and reduce unplanned maintenance events (dependent variable)**?

**Possible solution:** Implement machine learning algorithms and compare the accuracy of failure predictions and the frequency of unplanned maintenance events before and after implementation.

3. Does **training staff on advanced diagnostic tools and techniques (independent variable)** lead to faster **issue resolution and increased equipment uptime (dependent variable)**?

**Possible solution:** Conduct training sessions for staff on advanced diagnostic tools and techniques. Measure issue resolution times and equipment uptime to determine the impact.

4. Does **investing in high-quality, durable materials for equipment parts (independent variable)** reduce the **frequency of repairs and overall maintenance costs over time (dependent variable)**?

**Possible solution:** Switch to using high-quality, durable materials for critical equipment parts and monitor the frequency of repairs and maintenance costs over a specified period.

Edited by [Timothy Andrew Ramkissoo](https://classroom.emeritus.org/courses/9054/users/226697) (<https://classroom.emeritus.org/courses/9054/users/226697>) on May 18 at 11:25pm

↩ Reply 👍