



**Project 01**  
**Major Cineplex: Membership, Payment**  
**Showtime, Tickets, Booking movies**

**by**

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## **Business Domain**

A Business Domain in object-oriented programming is the set of classes that represent objects in the business model being implemented. Our group is assigned to work on the 'Entertainment' business domain which is related to a show, films, or other activities that entertain people and make them feel the most happiness. The company that we are working on is 'Major Cineplex', which is one of the largest companies in Thailand, and also a good example of analyzing their business rules and processes.

## **The Overview and Business Domain of Major Cineplex**

Major Cineplex Group Public Co. Ltd. have businesses in theatre, bowling alleys, karaoke, and the real estate industry. But in this context, they are mostly known for operating movie theatres. The company has 490 operating theatre screens around Thailand. Major Cineplex owns multiple theatres in Thailand and Laos, accumulating well over 10,000 seats in operation. Major Cineplex operates in multiple locations as branches, with each branch containing multiple theatres, which will have multiple showtimes of different movies. Customers will book their ticket using their accounts, which could be a permanent one or just an email, on either the web or the available machines. Major Cineplex also gains revenue from extra advertisements that will be shown before a movie is played in the theater, and around the complex. They also offer M-Gen and M-pass services, which are beneficial discounts customers could register for as a membership.

## **The History**

The company was founded in 1994 by Vicha Poolvaraluck, whose family businesses have roots in movies and film studios. The first large-scale cinema was opened in 1996, on Nakornchaisri road in Pinklao Bangkok. Then, Cineplex Ratchayothin contained 14-screens, 4000-seat, which would be the first IMAX cinema in Thailand. The business continues to this day.

## **Mission and Vision**

The company fails to provide any vision or mission statement, but we can easily infer from their investor-centric website that they seek to sustain profit like all companies do. The mentioned investor-centric website contains a large amount of information regarding profits margin, revenue, and stakeholder information. Thus we can conclude that Major Cineplex is a typical all-consuming corporation perpetually expanding, making profits, and underpaying their lower-tier employees while providing entertainment for the general population whose life lacked excitement under the pretext of being insignificant cogs working ceaselessly in a larger incomprehensible machine.

## **Membership and Payment process**

The Membership and Payment process includes

1. Registering for a membership.
2. Select a movie.
3. Selecting a cinema.
4. Select the showtime.
5. Choosing the cinema hall.
6. Choosing a seat.
7. Making the payment.
8. Getting a ticket.

## **Difference between M Pass and M Gen**

**M Pass:** Watch 1 movie for free/per month (Not the same movie).

**M Gen:** Collect points and use this point as a discount.

### List of all Entities with Attributes:

1. Theater (Theater\_ID, Showing\_system[2D,3D,IMAX,4DX], Size)
2. Branch (Branch\_ID, Address, Telephone\_number)
3. Ticket Machine(Machine\_ID, Status)
4. Ticket (Ticket\_id, Date, Time, Price)
5. Showtime (Showtime\_ID, Date, Time)
6. Weekly Box Office (Week\_number, Date, Country[Major, US])
7. Movie (Movie\_ID, Movie\_name, Movie\_genre, Movie\_rate[18+ or sth], Release\_Date, Movie\_length, Soundtrack, Subtitle, System[2D,3D], Synopsis)
8. Rating (Rating\_ID, Rating\_score, Rated\_time, Description)
9. News (News-writer Alias, News\_id, Headline, Description)
10. Seat (Seat\_ID, Seat\_type, Seat\_price, Seat\_availability)
11. Customer (Email, First Name, Last Name)
  - a. Registered Customer (super, Citizen\_id, Birthdate, Address, Telephone\_number, Nationality, Religion)
12. Director (Director\_ID, First name, Last name, Nationality, Gender)
13. Actor (Actor\_ID, First name, Last name, Nationality, Gender)
14. Employee (Citizen\_ID, Birthdate, Address, Telephone number, Nationality, Religion, Salary, First\_name, Last\_name, Gender)
  - a. News-writer (NewsWriter\_ID, Alias)
15. Order Transaction (Order\_ID, Date, Time, Cost)
16. Account (Account\_ID, Citizen\_ID, Card\_number, First\_name, Last\_name, Gender, Age, Nationality, Register\_date, Username, Hashed\_password)
17. Card (Citizen\_ID, Card\_number, First\_name, Last\_name, Address, Age, Birthdate, Nationality, Issued\_Date, Expiry\_Date)
  - a. M-Gen (super, Point, Balance)
  - b. M-Pass (super, Package)
18. Advertisement (Advertisement\_ID, Advertisement\_name, Company, Advertisement\_cost, Advertisement\_tax)
19. Promotion (Promotion\_ID, Issue\_date, Expired\_date, Description)

## Business Rules

No	Business Rules and Constraints	Relationships
1	One Theater has many Seats. One Seat can be in one Theater.	1:M
2	One Theater has many Tickets. One Ticket can be used with one Theater.	1:M
3	One Theater has many Movies. One Movie can be shown in many Theaters.	N:M
4	One Showtime can have one Movie. One Movie can be in many Showtime.	1:M
5	One Theatre has many Showtimes. One Showtime can be in one Theatre.	1:M
6	One Branch has many Promotions. One Promotion can belong to many Branches.	N:M
7	One Ticket belongs to one Customer. One Customer can buy many Tickets.	1:M
8	One Ticket includes one Seat. One Seat can be included in many Tickets.	1:M
9	One Ticket can be used with one Showtime. One Showtime can be included in many Tickets.	1:M
10	One Ticket can be purchased with one M-Pass. One M-Pass can be used to buy many Tickets.	1:M
11	One Ticket can be purchased with one M-Gen. One M-Gen can be used to purchase many Tickets.	1:M
12	One Registered Customer can have one Account. One Account is for one Registered Customer.	1:1
13	One Account binds with one M-Gen One M-Gen binds with one Account	1:1

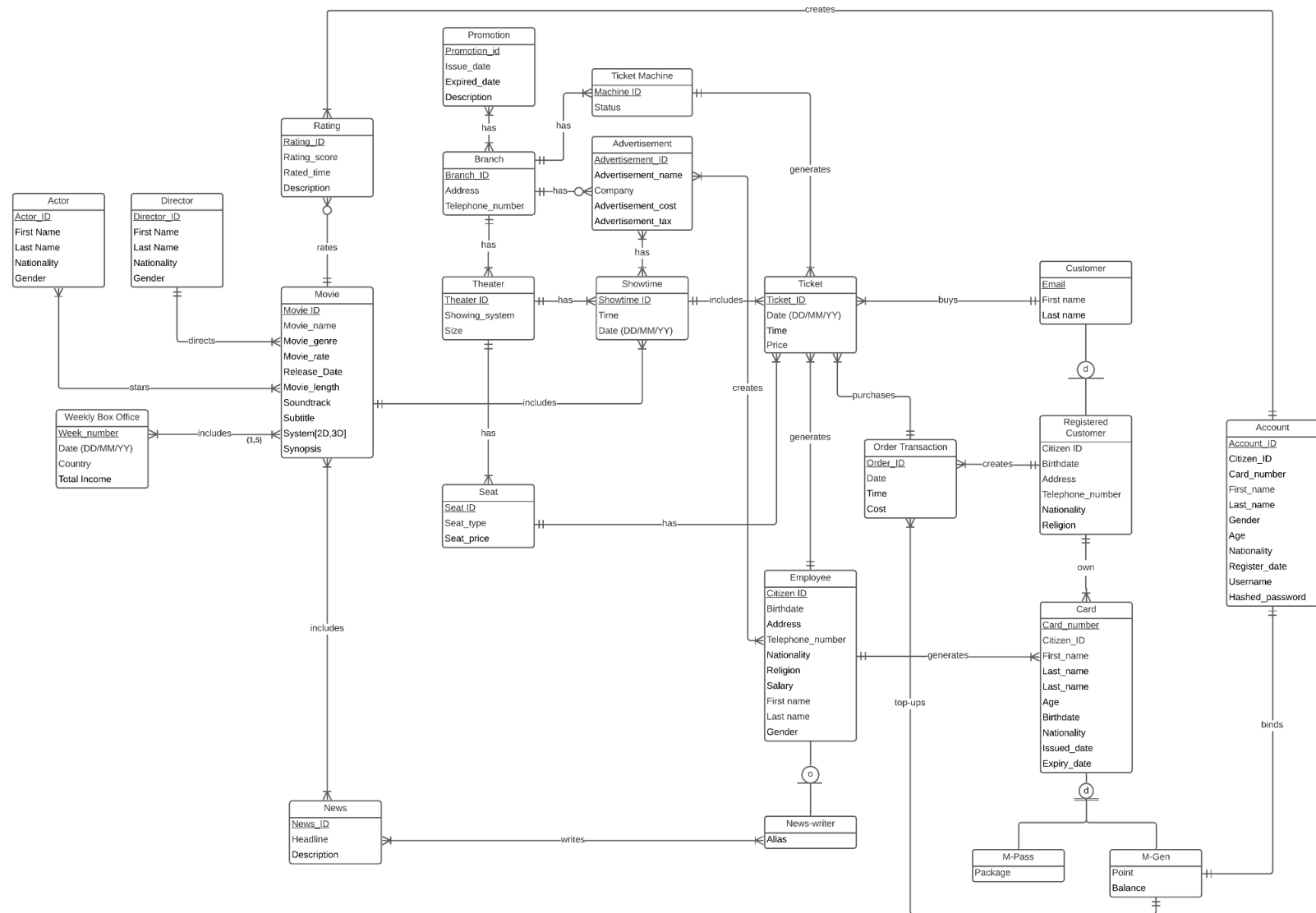
No	Business Rules and Constraints	Relationships
14	One Registered Customer can have many Cards. One Card is owned by one Registered Customer.	1:M
15	One Account can create many Ratings. One Rating can be created by one Account.	1:M
16	One Rating belongs to one Movie. One Movie can have many Ratings.	1:M
17	One Director can direct many Movies. One Movie is directed by one Director	1:M
18	One Actor can star in many Movies. One Movie can have many Actors.	N:M
19	One News-writer can write many News. One News can be written by many News-writers.	N:M
20	One News can be included in many Movies. One Movie can have many related News.	N:M
21	One Registered Customer can make many Order-transactions. One Order-transaction is made by one Registered Customer.	1:M
22	One Order-transaction top-ups one M-Gen. One M-Gen can be Top-ups by many Order-transactions.	1:M
23	One Weekly Box Office has many movies. One Movie can be included in many Weekly Box Office.	N:M
24	One Ticket Machine can generate many Tickets. One Ticket can be generated by one Ticket Machine.	1:M
25	One Branch can have many Theaters. One Theater can be in one Branch.	1:M
26	One Branch can have many Ticket Machines. One Ticket Machine is in one Branch.	1:M

No	Business Rules and Constraints	Relationships
27	One Advertisement can be included in many Showtimes. One Showtime has many Advertisements.	N:M
28	One Advertisement can be advertised in many Branches. One Branch has many Advertisements.	N:M
29	One Employee generates many Tickets. One Ticket can be generated by One Employee.	1:M
30	One Employee can generate many M-Passes. One M-Pass is generated by one Employee.	1:M
31	One Employee can generate many M-Gens. One M-Gen is generated by one Employee.	1:M
32	One Employee can create many Advertisements. One Advertisement can be created by many Employees.	N:M
33	One Weekly Box Office includes only 5 top-earning movies.	Constraint
34	One Person can create one Rating per one Movie	Constraint
35	Booking seats must not be more than 6 seats per transaction.	Constraint
36	A Person can book one Opera Chair(type of Seat) per transaction.	Constraint
37	Login/Input an email before purchasing the tickets.	Constraint
38	One Ticket can be used to enter once.	Constraint
39	One M-Pass can be used once per Movie.	Constraint
40	One Customer can activate only one M-Gen.	Constraint
41	One Customer can activate only one M-Pass.	Constraint
42	M-Gen top-up must be between 10-10,000THB each time.	Constraint



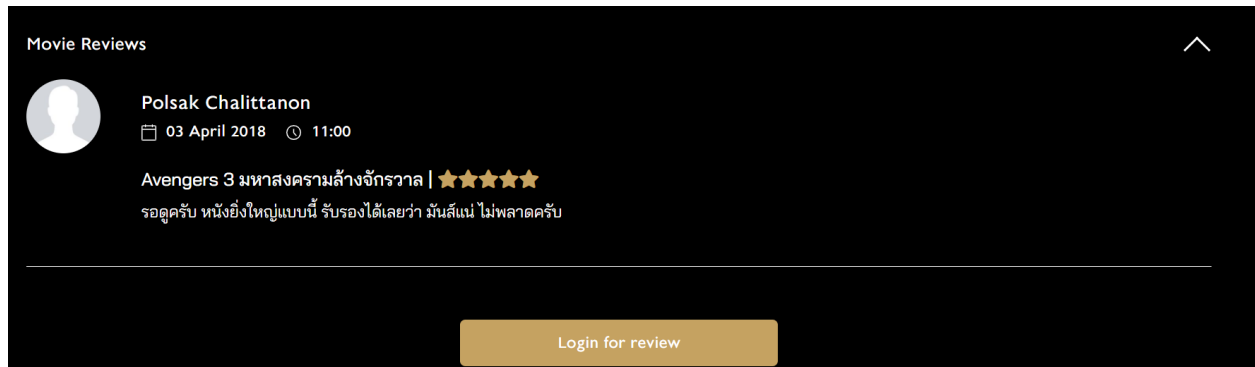
No	Business Rules and Constraints	Relationships
43	M-Pass can only be used with 2D movies.	Constraint
44	A Person must log in to the website to create a Rating.	Constraint

## ER diagrams (ERD)

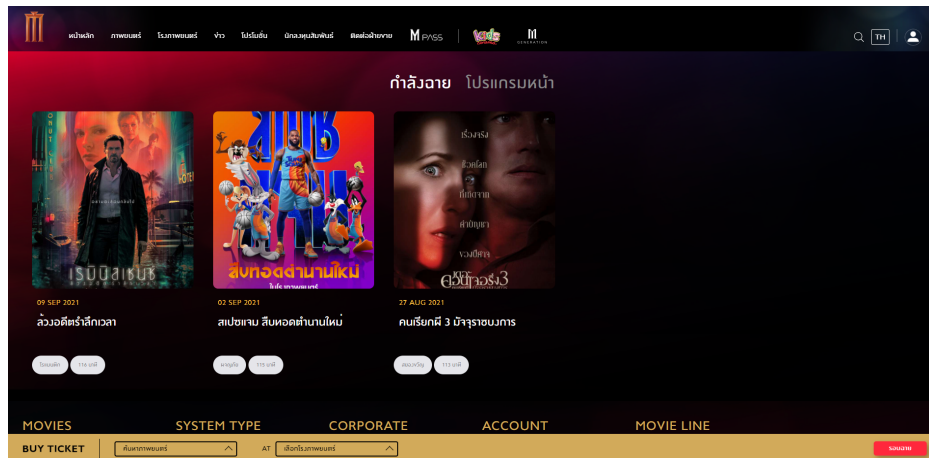


<https://lucid.app/lucidchart/6dd57563-8321-4b33-877d-64029142a270/view>

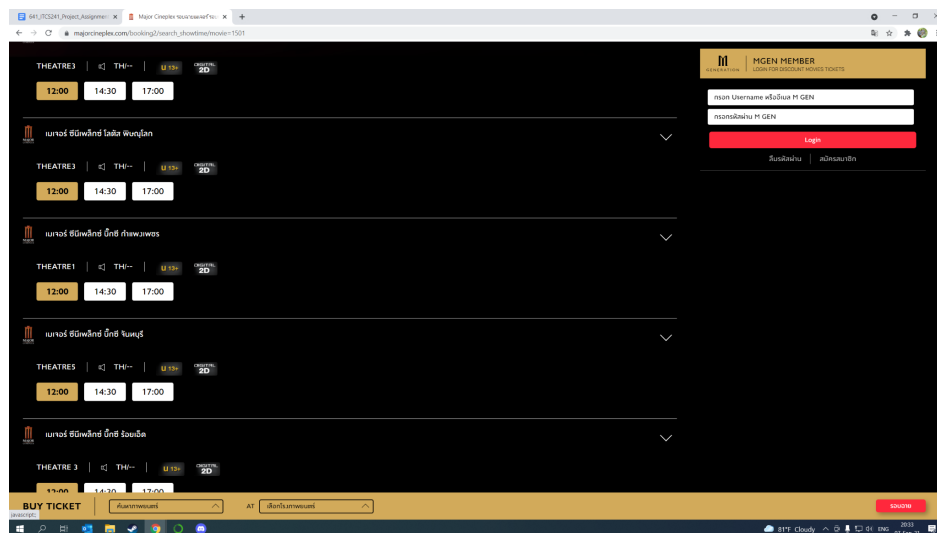
## Reference Pictures



## Movie Rating



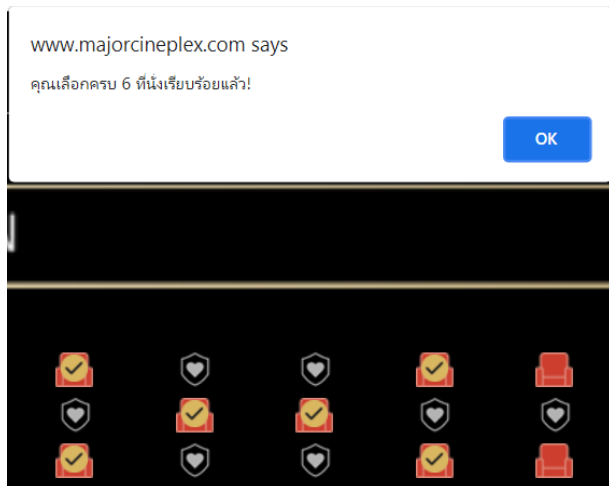
## Selecting Movie on Major Cineplex Website



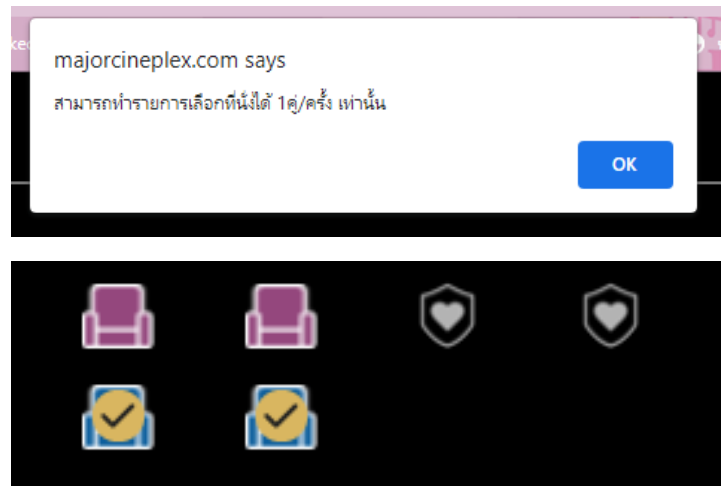
### Selecting time on Major Cineplex Website



Selecting Seat on Major Cineplex Website



Warning Message when you already reaches the maximum seats (Normal and Honeymoon Seat)



Warning Message when you already reaches the maximum seats (Opera Seat)

รายการสั่งซื้อทั้งหมด

นับถอยหลัง: 09:43

จำนวน

2 ชิ้น

Honeymoon O  
A9,A10

฿400

ราคารวมสุทธิ

฿400

ยืนยันทำการ

\*\* กรุณากรอกข้อมูลให้ครบถ้วนเพื่อใช้ในการยืนยันที่ซื้อ \*

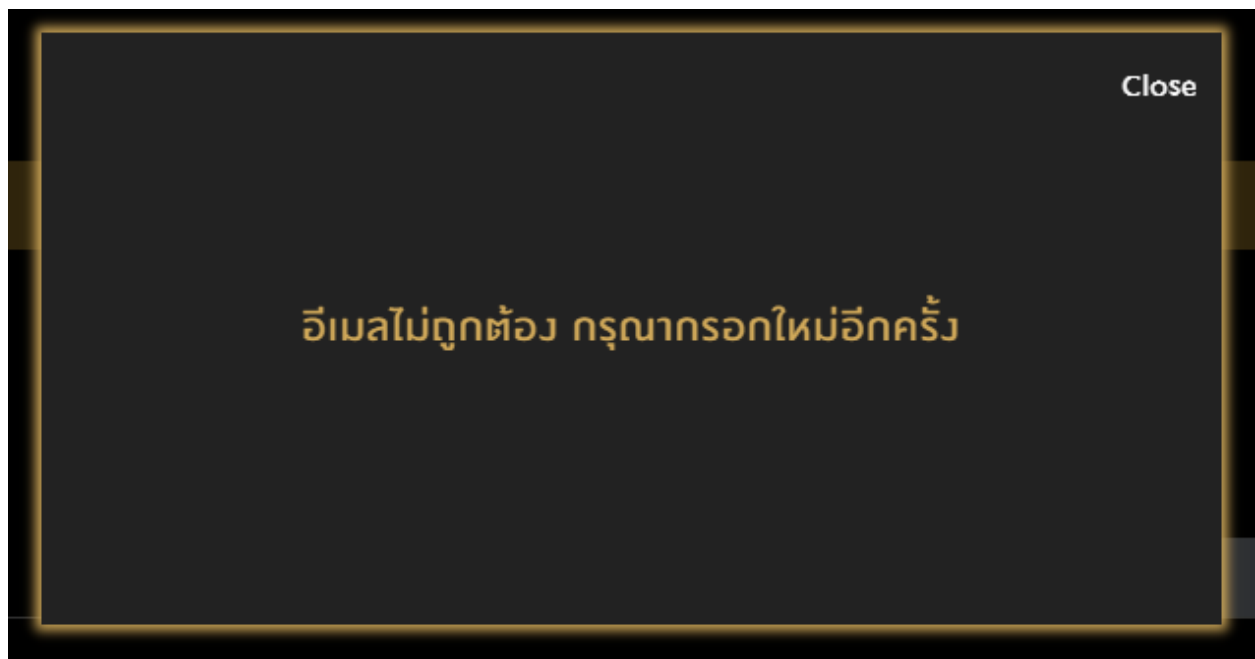
Emailกรอกอีเมล

Mobile

กรอกเบอร์โทรศัพท์ 10 หลัก

ชำระเงิน

เลือกช่องทางการชำระเงิน



Payment and Login Email Required

**Payment Method:** Credit/Debit Card or Rabbit Line Play



Credit/Debit Card

Rabbit Line Pay

After finished Payment >>  
(send to Email)

## References

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*<https://investor.majorcineplex.com/th/sustainable-development/sustainability/message-from-chairman>*

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