

Building Name Address	Use (as per FSA Annexed Table 1)	Date and Time of Incident	Structure and Stories Area	Extent of Damage (Damaged Area/ Total Area)	No. of Casualties
Matsuya Ginza Department Store	Department Store (4)	Feb. 13, 1964	Fire resistive 8 stories above ground and 3 below	All · Half · Partial · Small 3,862 m ² (8%)	Fatalities 0
		Breakout at 15:33 (approx.)	Building Area 4,739 m ²		Injured 24 (22)
3-1 Ginza, Chuo-ku, TOKYO		Noticed at 15:27 Notified by emergency call	Gross Floor Area 45,659 m ²		
		Extinguished by 21:07			

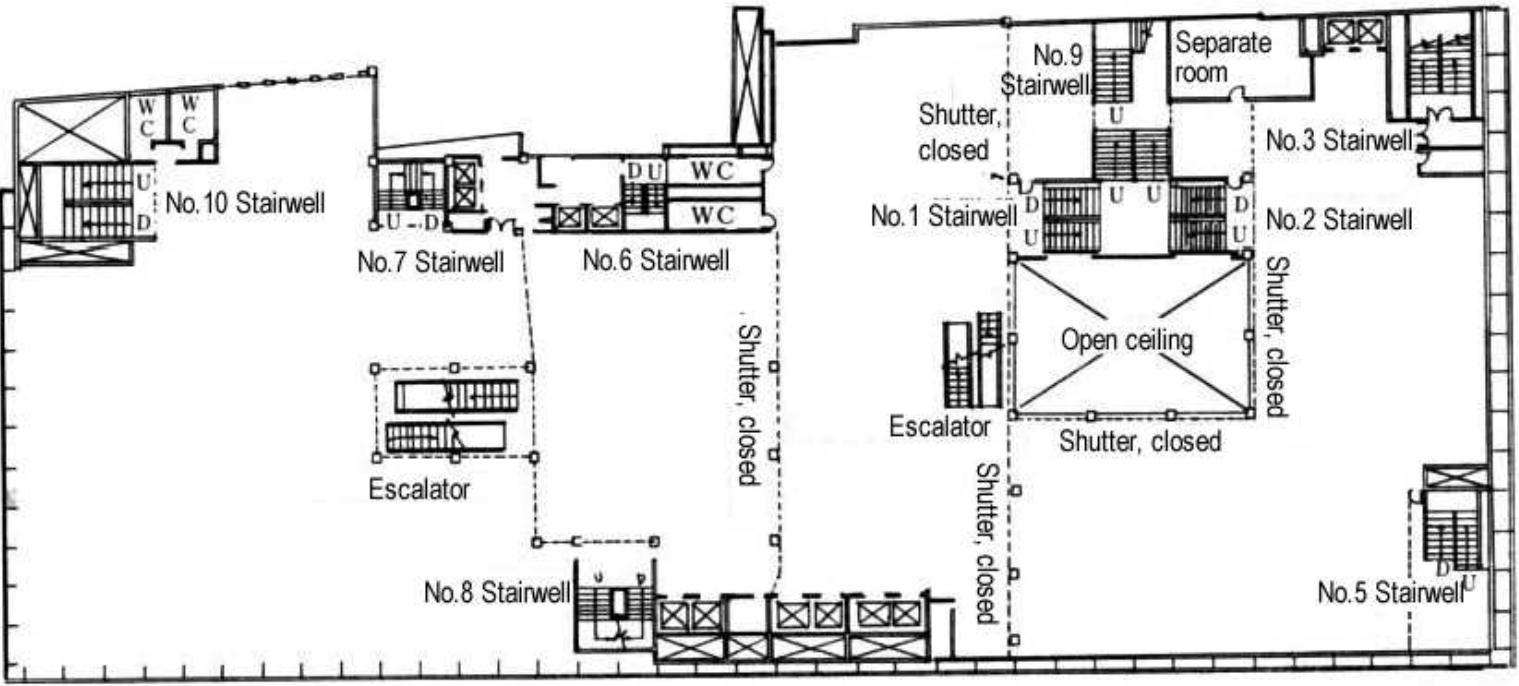
I. Summary of Fire Incident

(1) Summary	Within 6 months of the Seibu Department Store Fire, another department fire occurred in the Ginza area. The fire emerged from the vicinity of the shutter between the ongoing construction area and the existing sales floor on the 5th floor. There are many similarities between this fire and the Seibu Department Store Fire: for example, it started in the upper part of the building, spread to the upper floors, occurred during off-business hours, and there was ongoing construction occurring. The result of this fire brought the entire nation's attention to the fact that even a fire resistive building can in fact burn well.							
	(2) Conditions per Floor	FL	Gross area	Damaged area	Use (Purpose)	No. of persons	No. of fatalities	Fire escape equipment
		m ²	m ²				8 units of inside stairs	Fire extinguishers
R3		246.35		Observation deck			1 escape chute per floor (3rd to 8th)	Indoor fire hydrants
R2		294.27		Observation deck				Sprinkler system (inactive due to ongoing construction)
R1		535.42		Recreation space				Automatic fire detection system
8		4,169.62		Special sales, Restaurant	8			2 units of MM-type fire alarm (automated fire transmitter)
7		4,287.88	769	Sales	42			Water pipe connections
6		4,458.90	1,020	Sales	2			
5		4,512.97	2,073	Sales				
4		4,594.49		Sales	4			
3		4,674.17		Sales	5			
2		4,565.38		Sales	11			
1		4,739.25		Sales	29			
B1		5,006.96						
B2	2,151.64							
B3	1,422.18							
Total	45,659.48	3,862		101	0			
(3) Origin of Fire	(Floor, Room, Part, Combustibles, Habitable/Non-habitable Rooms, Present/Absent)				(4) Cause of Fire	<u>Unknown</u>		
	Near the office supplies section on the 5th floor that was located next to the construction site for the additional building.					The cause of fire could not be determined, but was believed to be from sparks scattered by ongoing oxygen welding work on the 6th floor for the construction project. From around 13:00, the contractors were cutting through existing steel pipes that were embedded on the floor, which was right above the office supplies section of the 5th floor, and sparks may have landed on the ceiling that was made of plywood and hardboard.		

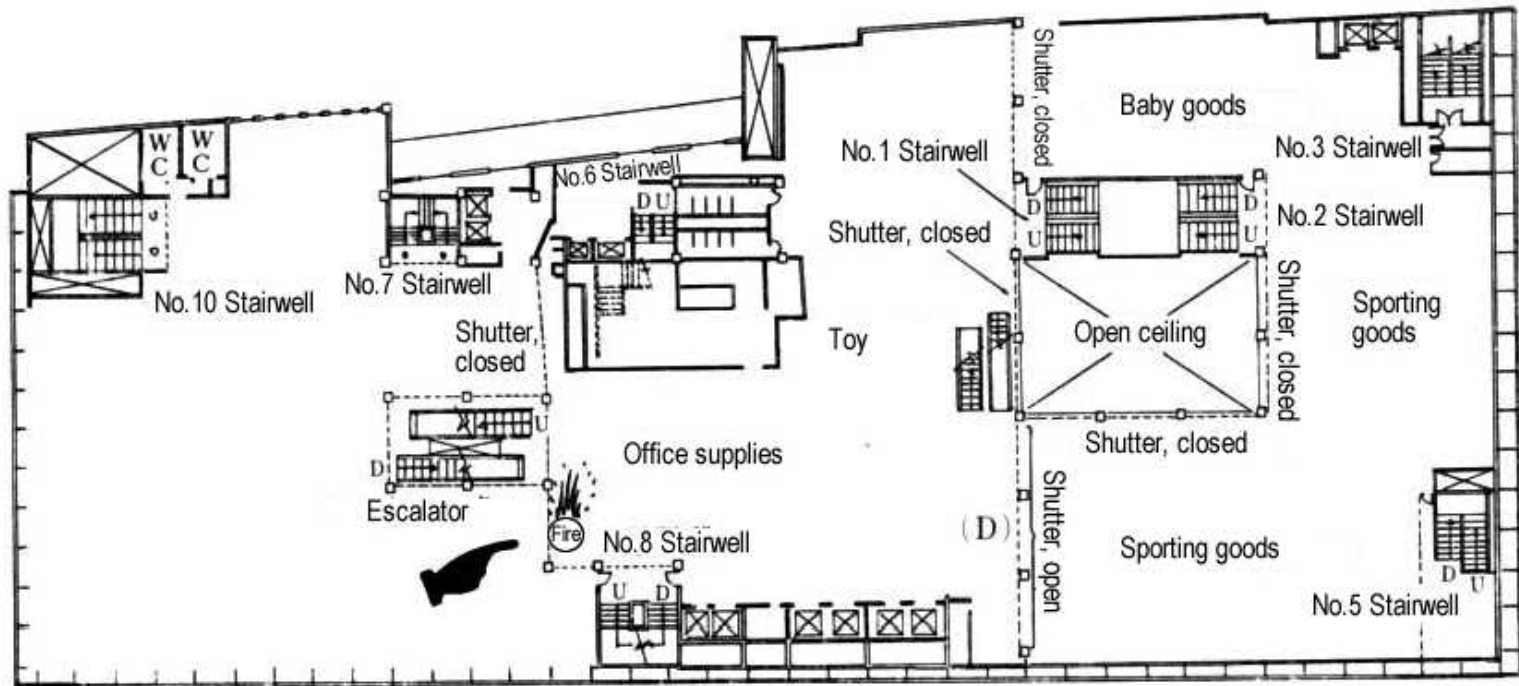
(5) Fire Propagation Path	(Location of Fire Source)	(Propagation from Source)	(Propagation to Adjacent Zones)	(Propagation to Upper Floors)
	Near the office supplies section	To the sales goods	Through the accidentally opened D-type fire shutter	Via the stairway of the 5th floor on the south-west side of the building
	To the sales goods near the stairwell shutters on the 6th and 7th floors			
	<p>The fire emerged near the office supplies section on the 5th floor. The partition walls in the construction site area prevented the flames from spreading, but instead, the flames moved toward the toy section where the fire shutters close in the direction of south to north. However, the other shutter on the west side opened by itself (about 3/4 open) and therefore the flames reached the sporting goods section and then spread across the open ceiling area. Meanwhile, the heat from the fire was transferred upward along stairwell No.5 (on the south-west side of the building) because the west-side wall had been wide open for construction and to let fresh air in. This heat made the shutters on the 6th and 7th floor hot enough to ignite nearby combustibles, and resulted in the fire spreading to the 6th and 7th floors.</p>			
	<p>○ Main Reasons for the Propagation of the Fire</p> <ul style="list-style-type: none"> ○ The store was closed for the day so all the shutters and doors were closed on each floor. Firefighters struggled to enter the building because the exterior walls were concealed by construction sheets and steel wire nets and the building was filled with heavy smoke and heat, as is common in a fire in a fire-resistive structure. ○ On the 5th floor, one of the stairwell shutters remained open and combustible materials were piled up near the stairway. <p>○ Smoke Propagation Path</p> <p>The smoke penetrated to the upper floors through the unclosed shutter of the stairwell on the 5th floor.</p>			
II. Summary of the Building				
(1) Built	<p>Construction, Completion and Major Renovations</p> <p>(Completion) 1924 (Request for additional construction permit) Jan. 12, 1963 (Planned Completion) May 1964 (80% completed when the fire broke out)</p>			
Fire Prevention Management	(2) Vertical Shafts		(3) Fire Prevention	
	Stairs [X] Elevator [X] Escalators [X]	Duct Spaces [X] Pipe Shafts [X] Other () [X]	<ul style="list-style-type: none"> ○ The store had appointed a fire-prevention manager, a fire-prevention supervisor and in-house firefighting team and had submitted a fire defense plan to the fire station. ○ The store maintained good daily fire-prevention management, voluntary inspections and night patrols. ○ Although the store was closed, 23 people were working, but no-one was present on the 5th and 6th floors. They were supposed to patrol 3 times that day; however, no-one went on patrol after 14:00 due to scheduling conflicts. 	
	(4) Fire Compartments		(5) Firefighting Equipment	
	<ul style="list-style-type: none"> ○ On the sales section of each floor, a fire shutter closes in the direction of north to south. ○ The construction site and the existing section were partitioned by corrugated metal walls and hardboard walls. 		<ul style="list-style-type: none"> ○ A sprinkler system was being installed (on the 3rd to 5th floor portions of the current building). 	

III. Actions Taken after the Fire was Detected									
(1) First Detected	<ul style="list-style-type: none"> ◦ Detected by (Store staff, contractor, security personnel) ◦ How and why (Presence of smoke) ◦ Action taken (Alerted the store's security and administration offices) <hr style="border-top: 1px dashed black;"/> <p>The following people noticed the fire relatively earlier:</p> <ul style="list-style-type: none"> ◦ Electrical technician H of Matsuya (age 45) --- A little after 15:00, near the wicket door of a shutter that was located in the furniture section on the 7th floor, H was looking for the desk he had purchased the day before and noticed slight smoke coming out from the escalator area. Therefore, he instructed to store staff D to call the security office on the 1st floor and the electrical room. ◦ Construction worker I (age 22) --- While in the temporary office for the construction site that was next to the sales section on the 5th floor, he noticed smoke gathering around the ceiling from the upper part of the partition wall to the sales section. He made a call to the administrative office of the store. ◦ Security personnel T (age 36) --- When he was observing the wiring work for the fire alarm system, he noticed the smoke gathering around the upper part of the shutter. 								
	<table border="0" style="width: 100%;"> <tr> <td style="width: 20%;">Emergency Call</td> <td style="width: 40%;">Yes [X] (Security personnel)</td> <td style="width: 40%;">Time elapsed since the discovery (4) minutes</td> </tr> <tr> <td></td> <td>No []</td> <td></td> </tr> </table> <hr style="border-top: 1px dashed black;"/> <p>Store staff D made an internal call to the security office and alerted them of the smoke around the escalator on the 7th floor. Security guard M made a 119 call and reported that a fire had broken out on the 6th and 7th floors of Matsuya Department Store. The head of the store staff announced detection of a fire over the PA system and directed no-one to panic.</p>	Emergency Call	Yes [X] (Security personnel)	Time elapsed since the discovery (4) minutes		No []			
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	No []								
(3) Initial Firefighting Activities	<table border="0" style="width: 100%;"> <tr> <td style="width: 15%;"></td> <td style="width: 30%;">Successful [] Failed [X]</td> <td style="width: 55%;">(Reasons or Conditions)</td> </tr> <tr> <td style="text-align: center;">Initiated</td> <td> <ul style="list-style-type: none"> ◦ Extinguished time [X] ◦ Firefighting difficulties [X] ◦ Firefighting method [] </td> <td rowspan="2"> <ul style="list-style-type: none"> ◦ The store staff and contractors who were on the 1st to 3rd floors and 12 of the security guards who were in the main building grabbed fire extinguishers and ran up the stairs. From the construction site, 10 of the construction workers also rushed with fire extinguishers to the location of the fire, but they could not extinguish it. ◦ On the open ceiling area, a few security guards extended some hoses from 2 outdoor fire hydrants and sprayed water onto the fire shutters that were becoming hot. However, they all had to evacuate because, for some reason, the D-type shutter for the sales section opened by itself and smoke poured through. The other store staff also fought the fire with indoor fire hydrants on the 6th and 7th floors. </td> </tr> <tr> <td style="text-align: center;">Not Initiated</td> <td> <ul style="list-style-type: none"> ◦ Extinguished time [] ◦ Firefighting difficulties [] ◦ Firefighting method [] ◦ Other [] </td> </tr> </table>		Successful [] Failed [X]	(Reasons or Conditions)	Initiated	<ul style="list-style-type: none"> ◦ Extinguished time [X] ◦ Firefighting difficulties [X] ◦ Firefighting method [] 	<ul style="list-style-type: none"> ◦ The store staff and contractors who were on the 1st to 3rd floors and 12 of the security guards who were in the main building grabbed fire extinguishers and ran up the stairs. From the construction site, 10 of the construction workers also rushed with fire extinguishers to the location of the fire, but they could not extinguish it. ◦ On the open ceiling area, a few security guards extended some hoses from 2 outdoor fire hydrants and sprayed water onto the fire shutters that were becoming hot. However, they all had to evacuate because, for some reason, the D-type shutter for the sales section opened by itself and smoke poured through. The other store staff also fought the fire with indoor fire hydrants on the 6th and 7th floors. 	Not Initiated	<ul style="list-style-type: none"> ◦ Extinguished time [] ◦ Firefighting difficulties [] ◦ Firefighting method [] ◦ Other []
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(4) Summary of Firefighting Activities	<p>(Obstacles or Difficulties in Fire Control)</p> <ul style="list-style-type: none"> ◦ Firefighters struggled to understand the conditions inside the building because the exterior was swathed in protective sheets and wire netting for the construction, which became unusual obstacles for the set up of their ladders to enter the building. ◦ The firefighters who entered via the stairs also struggled with the closed fire shutters and doors that were difficult to open. Moreover, the fire broke out in an area between the construction site and the existing floor, which was partitioned by corrugated metal walls and hardboard walls and some areas even had a big hole on the floor. Under such conditions, although the firefighters were able to enter the building, they could not use water effectively. ◦ The fire-resistive building created large amounts of smoke and heat as usual, which created a difficult environment for the firefighters and many of the 22 injured suffered corneal flash burns. 								

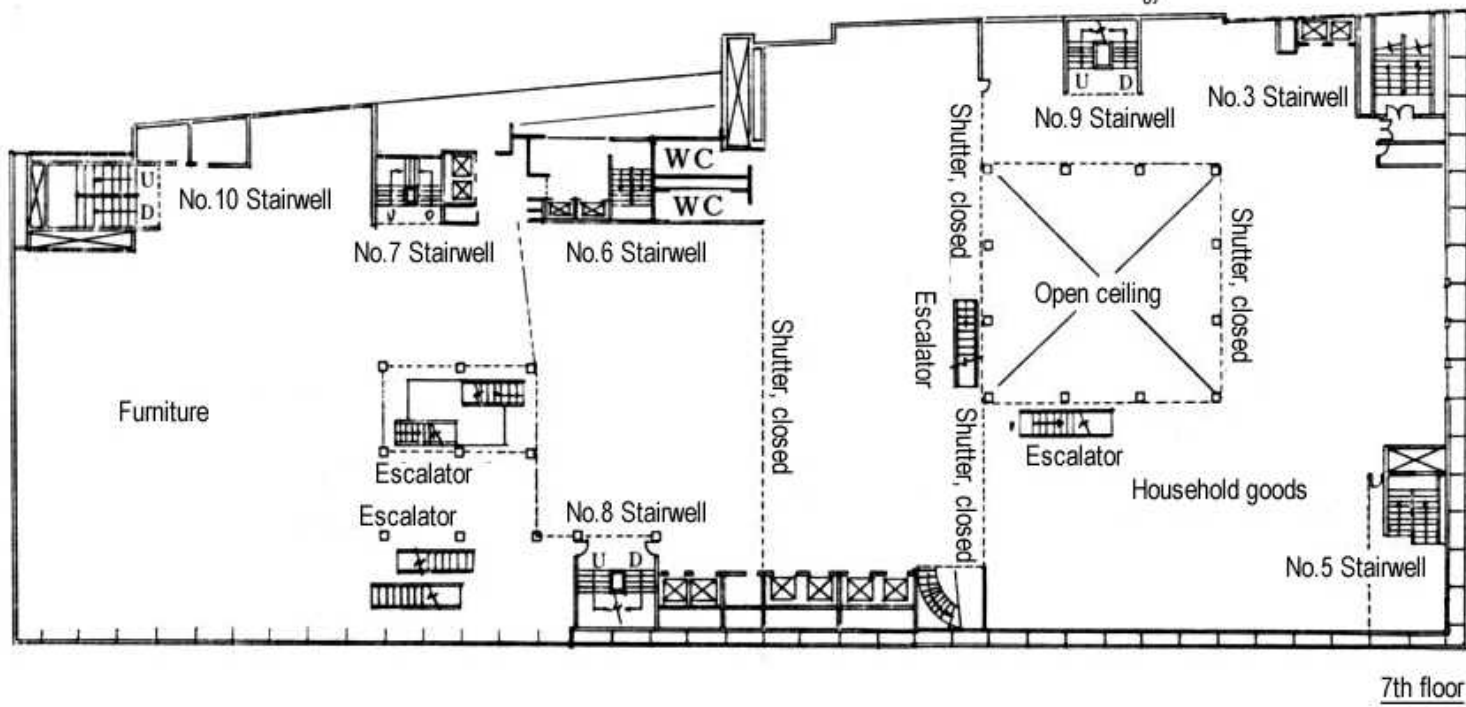
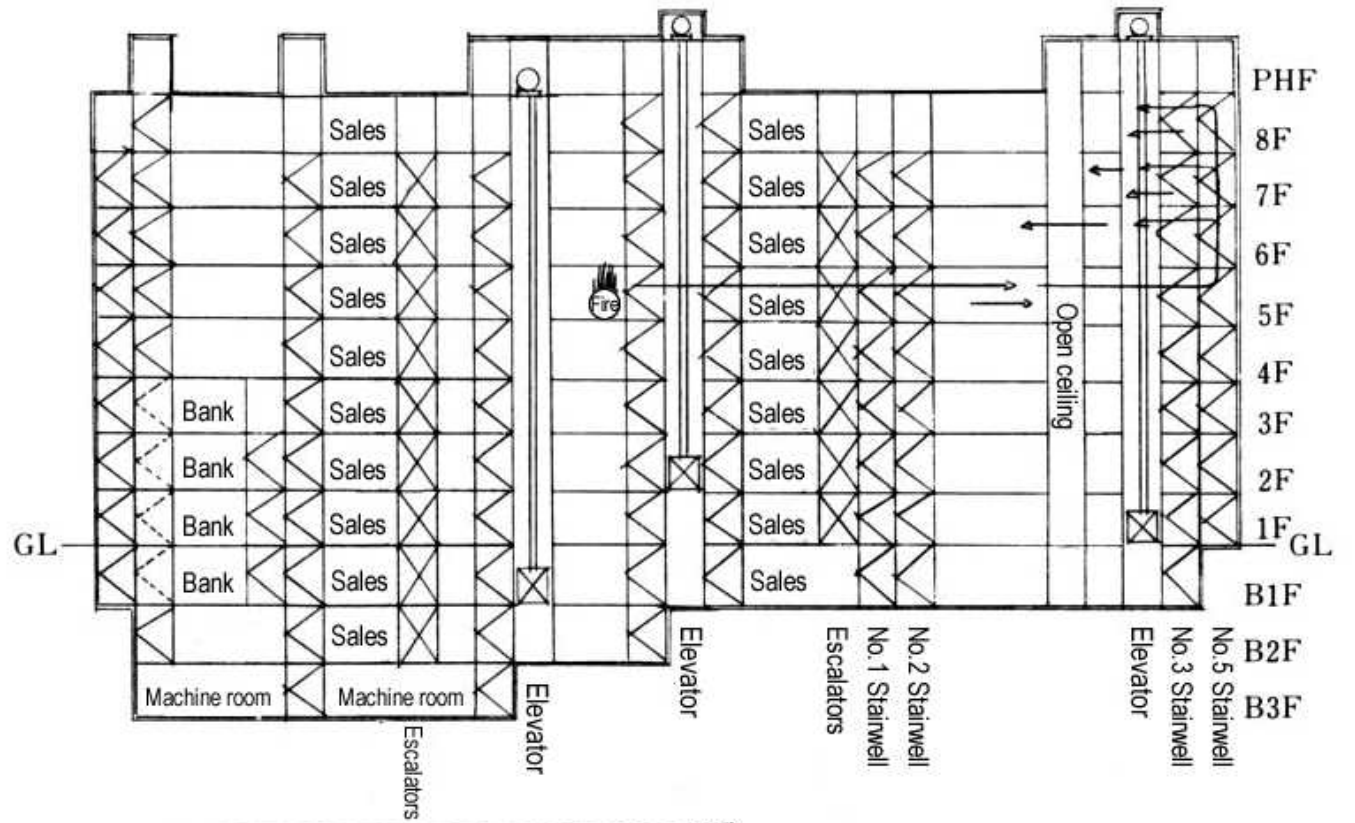
(5) Evacuation	Means of Escape (No. of Persons)	Obstacles to Evacuation
	<ul style="list-style-type: none"> ◦ Stairs [] () ◦ Elevators/Escalators [] () ◦ Escape equipment [] () ◦ Directly to the ground from windows or openings [] () ◦ Rescued [X] (1) ◦ Other [] () 	<ul style="list-style-type: none"> ◦ No windows [] ◦ Barred openings [] ◦ Locked emergency doors (Exits) [] ◦ Alarm System [] (Poorly controlled, Malfunctioned, Not installed) ◦ Power outage [] ◦ Other []
	<ul style="list-style-type: none"> ◦ Firefighters set up the ladder and rescued 1 person trapped on the 6th floor. ◦ When the fire broke out, there were 101 store staff and contractors in the building, who were all familiar with their way around the building. Therefore, instead of being guiding in a systematic evacuation, most of the people evacuated by themselves following instructions delivered over a loudspeaker, and some of them helped to extinguish the fire at the early stage. (2 injured, 1 rescued) 	
(6) Causalties	Healthy individuals (Drunk persons) Individuals in need of assistance Infants Elderly Handicapped Patients/ill persons	Obstacles to Evacuation
	None	<ul style="list-style-type: none"> ◦ No windows [] ◦ Barred openings [] ◦ Locked emergency doors (Exits) [] ◦ Alarm System [] (Poorly controlled, Malfunctioned, Not installed) ◦ Power outage [] ◦ Other []
IV. Issues and Lessons Learned		
<p>The risk of disaster doubled in the Matsuya Ginza Department Store Fire when management decided to keep the store open for the period of construction (remodeling and addition of new building). The most notable issue was that store management and the contractors failed to communicate effectively in order to prevent a fire from occurring during the construction period.</p>		



6th floor



5th floor



7th floor