

# WHY THEME PARK ENTRY DELAYS BREAK OPERATIONS AT SCALE

(AND WHY QUEUES  
START BEFORE THE RIDE)

The real bottleneck isn't the ride.  
It's getting guests in the gate.



ENTRY DELAYS  
CREATE LONGER QUEUES,  
LOWER CAPACITY, HIGHER  
COSTS, AND POORER  
GUEST EXPERIENCES.

## BEFORE THE RIDE, THE DAMAGE IS ALREADY DONE:



**GUESTS QUEUE  
LONGER**

Frustration starts  
at the gate.



**CAPACITY  
IS REDUCED**

Fewer guests,  
less revenue.



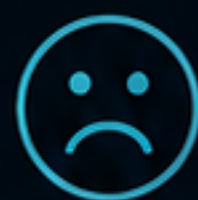
**OPERATIONS  
SLOW DOWN**

Delays compound  
across the day.



**COSTS  
INCREASE**

More staff, more  
hours, lower efficiency.

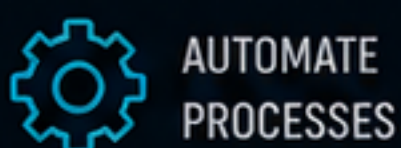


**EXPERIENCE  
SUFFERS**

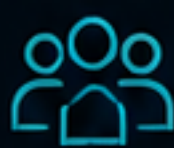
First impressions  
last.



**SOLVE THE ENTRY. UNLOCK THE PARK.  
BETTER FLOW. HIGHER CAPACITY. HAPPIER GUESTS.**



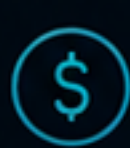
**AUTOMATE  
PROCESSES**



**REDUCE  
QUEUES**



**IMPROVE  
THROUGHPUT**



**LOWER COSTS**



**DELIVER BETTER  
EXPERIENCES**

# WHY ENTRY DELAYS INCREASE AT SCALE

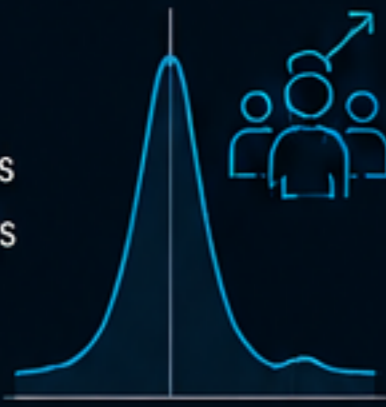
As more guests arrive at once, small constraints create big disruptions.



## 1 DEMAND IS EXTREMELY CONCENTRATED

Theme parks experience:

- Opening-time surges
- Peak arrival windows
- Group and family arrivals



This creates:

- Thousands of visitors arriving at once
- Immediate pressure on entry systems

**ENTRY DEMAND PEAKS SHARPLY — NOT GRADUALLY.**

## 2 SECURITY SCREENING SLOWS THROUGHPUT

Modern parks require:

- Bag checks
- Security screening
- Restricted item control



Each check takes time.

At scale:

- Throughput is limited
- Queues grow quickly

**THROUGHPUT LIMITS CREATE GROWING DELAYS.**

## 3 BAGS ARE THE BIGGEST BOTTLENECK

Visitors often arrive with:

- Backpacks
- Food and drink
- Personal items



Each bag requires:

- Inspection
- Manual handling

This significantly slows:

- Security lanes
- Entry flow

**THE MORE BAGS, THE SLOWER THE ENTRY.**

## 4 MANUAL PROCESSES LIMIT SPEED

Entry systems often rely on:

- Staff interaction
- Visual checks
- Sequential processing



This creates:

- Limited throughput
- Staff dependency
- Slow processing rates

**MANUAL STEPS = LOWER THROUGHPUT.**

## 5 ENTRY POINTS HAVE FIXED CAPACITY

Theme park entrances are:

- Physically constrained
- Designed for movement, not queuing



At scale:

- Capacity is exceeded
- Queues extend beyond designated areas
- Congestion impacts safety and experience

**FIXED CAPACITY CAN'T ABSORB PEAK DEMAND.**

## 6 SMALL DELAYS COMPOUND QUICKLY

If each visitor takes just a few seconds longer:



- Queue length increases
- Waiting time escalates
- Congestion spreads across the site

**AT SCALE, SECONDS BECOME MAJOR DELAYS.**



**ENTRY DELAYS DON'T JUST ANNOY GUESTS. THEY DISRUPT OPERATIONS, REDUCE CAPACITY, AND HURT THE EXPERIENCE.**

Lower capacity

Poor first impressions

Reduced in-park spend

Lower operational efficiency

Negative reviews and reputation

**SOLVING ENTRY DELAYS STARTS WITH ELIMINATING BOTTLENECKS BEFORE THE RIDE.**

# THE HIDDEN IMPACT OF ENTRY DELAYS

Delays at the gate impact more than just the queue.



## 1. VISITOR EXPERIENCE STARTS NEGATIVELY

First impressions matter. Entry delays create:

- Frustration before the day begins
- Reduced excitement
- Lower satisfaction



## 2. LOST REVENUE TIME

Delayed entry means:

- Less time inside the park
- Reduced spending on food, retail, and attractions



## 3. OPERATIONAL PRESSURE

Staff must:

- Manage queues
- Handle complaints
- Maintain flow under pressure



## 4. CROWD AND SAFETY RISK

Large queues create:

- High-density areas
- Congestion at entrances
- Increased safety concerns



## 5. REDUCED CAPACITY EFFICIENCY

When entry slows:

- The park cannot utilise full capacity efficiently
- Throughput limits overall performance

## WHY TRADITIONAL FIXES DON'T WORK



### 1. ADD MORE STAFF



- Increases cost
- Limited improvement in throughput

#### THE RESULT:



Higher costs with limited impact on delays.



### 2. EXPAND ENTRY AREAS



- Space constraints
- Does not increase processing speed

#### THE RESULT:



More space, but the same slow process remains.



### 3. IMPROVE QUEUE MANAGEMENT



- Organises waiting
- Does not reduce waiting

#### THE RESULT:



Better looking queues, but not shorter ones.



### 4. STAGGER ENTRY TIMES



- Difficult to enforce
- Limited behavioural change

#### THE RESULT:



Some spread in demand, but peaks still overwhelm entry.



## THE REAL SOLUTION: BUILD ENTRY SYSTEMS THAT SCALE.



SPEED UP ENTRY



INCREASE THROUGHPUT



IMPROVE EXPERIENCES

Remove bottlenecks. Reduce delays. Maximise every minute of the guest experience.

# THE CORE PROBLEM: ENTRY SYSTEMS ARE THROUGHPUT-LIMITED

THEME PARK ENTRY IS BUILT ON:

- Sequential processing
- Staff-dependent checks
- Fixed capacity infrastructure

VS

BUT DEMAND IS:

- Peak-driven
- High volume
- Time-sensitive



**THROUGHPUT IS LIMITED, BUT DEMAND IS NOT.**

## THE BIGGEST HIDDEN DRIVER: PRE-ENTRY FRICTION

The biggest cause of entry delays is:

- Bag handling
- Security checks
- Manual processes



REMOVE FRICTION... AND ENTRY SPEED INCREASES DRAMATICALLY.



Faster Throughput



Shorter Wait Times



Better Guest Experience

## THE SCALABLE SOLUTION: REDUCE FRICTION BEFORE ENTRY

The most efficient parks don't just improve entry. They reduce what happens at entry.



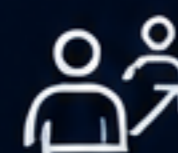
### PRE-ENTRY SMART LOCKER SYSTEMS

Smart lockers positioned before entry:

<p><b>1</b></p> <p><b>REMOVE BAGS BEFORE SECURITY</b></p>  <ul style="list-style-type: none"> <li>Faster screening</li> <li>Increased throughput</li> </ul> 	<p><b>2</b></p> <p><b>REDUCE TIME PER VISITOR</b></p>  <ul style="list-style-type: none"> <li>Fewer checks required</li> <li>Faster processing</li> </ul> 	<p><b>3</b></p> <p><b>ENABLE PARALLEL USAGE</b></p>  <ul style="list-style-type: none"> <li>Multiple users at once</li> <li>No queue dependency</li> </ul> 	<p><b>4</b></p> <p><b>IMPROVE FLOW INTO THE PARK</b></p>  <ul style="list-style-type: none"> <li>Less congestion at gates</li> <li>Faster entry</li> </ul> 	<p><b>5</b></p> <p><b>ENHANCE SECURITY COMPLIANCE</b></p>  <ul style="list-style-type: none"> <li>Fewer restricted items entering</li> <li>Safer environment</li> </ul> 
--	--	---	---	--



THE GOAL IS SIMPLE: REMOVE FRICTION. INCREASE THROUGHPUT.



HAPPIER GUESTS



HIGHER CAPACITY



BETTER OPERATIONS

# REAL OPERATIONAL IMPACT

With friction removed **before** entry:

**BEFORE: FRICTION**  
LONG DELAYS. LOW THROUGHPUT.

**AFTER: FRICTION REMOVED**  
FAST ENTRY. HIGH THROUGHPUT.

 <p><b>ENTRY DELAYS</b> Significantly reduced</p>	 <p><b>45-90</b> MINUTES average delay</p>		 <p><b>5-15</b> MINUTES average delay</p>
 <p><b>QUEUE LENGTHS</b> Decrease</p>	 <p><b>LONG, DENSE QUEUES</b> extend beyond entrance areas</p>		 <p><b>SHORTER QUEUES</b> contained within entry areas</p>
 <p><b>VISITOR SATISFACTION</b> Improves</p>	 <p><b>LOWER SATISFACTION</b> negative first impression</p>		 <p><b>HIGHER SATISFACTION</b> positive start to the day</p>
 <p><b>REVENUE PER GUEST</b> Increases</p>	 <p><b>LOWER SPEND</b> less time in park, lower spend</p>		 <p><b>HIGHER SPEND</b> more time in park, higher spend</p>
 <p><b>SAFETY</b> Improves</p>	 <p><b>HIGHER RISK</b> crowding, frustration, safety concerns</p>		 <p><b>IMPROVED SAFETY</b> better flow, less congestion, safer environment</p>

## THE BOTTOM LINE

Theme park entry delays are not just a queue problem. They are a **system design problem**.

### AT SCALE:



**DEMAND SPIKES**  
Thousands of visitors arrive in a short time.



**THROUGHPUT IS LIMITED**  
Entry systems can only process so many at once.



**DELAYS BECOME INEVITABLE**  
Queues grow, experiences suffer, and operations are impacted.



**THE SOLUTION:**  
REMOVE FRICTION  
BEFORE THE QUEUE FORMS

Build entry systems that increase throughput and scale with demand.



### FASTER ENTRY

Get more guests in, more efficiently.



### BETTER EXPERIENCES

Happy guests from the moment they arrive.



### HIGHER REVENUE

More time in park, more spend per guest.



### SAFER OPERATIONS

Less congestion, lower risk.

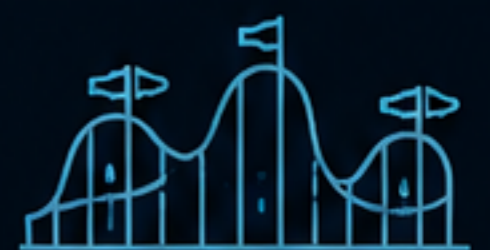


### STRONGER PERFORMANCE

Maximise capacity. Drive long-term growth.



REMOVE FRICTION. INCREASE THROUGHPUT.  
DELIVER BETTER EXPERIENCES. **AT EVERY SCALE.**



# ADVENTURE PARK SMART LOCKER 4 STEP BAG PROCESS

A faster, safer and frictionless entry experience for every guest.



-  REMOVE BAGS
-  SPEED UP SECURITY
-  ENHANCE EXPERIENCE

## 1 DROP YOUR BAG AT THE SMART LOCKER



- Select an available locker
- Place your bag inside
- Close the door

**OUTCOME:**  
Your bag is safely stored

## 2 GET YOUR DIGITAL KEY IN SECONDS



- Receive your unique PIN, QR code or digital key via SMS, Email or App
- Keep it safe until retrieval

**OUTCOME:**  
You have secure access to your locker

## 3 ENJOY THE PARK HANDS-FREE



- Head straight to the attractions
- No bag checks
- No holding, no hassle

**OUTCOME:**  
A seamless, hands-free experience

## 4 RETRIEVE YOUR BAG WHEN YOU'RE DONE




- Enter your PIN, scan QR code or use your digital key
- Open your locker and take your bag
- Close the door

**OUTCOME:**  
Quick, easy and secure bag retrieval


**WHY SMART LOCKERS ARE PERFECT FOR ADVENTURE PARKS**

 REDUCE BAG CHECK BOTTLENECKS

 INCREASE ENTRY THROUGHPUT

 IMPROVE SECURITY & SAFETY

 BOOST GUEST SATISFACTION

 DRIVE MORE REVENUE PER GUEST