



FY21 Budget Outlook

May 14, 2020



General Manager introduction

We have experienced the deepest and most rapid decline of ridership in BART history – prior to the pandemic, we had an average of about 400,000 weekday riders, but over the last six weeks we have averaged about 26,700 weekday riders – meaning a ~95% decrease in ridership

The return of ridership is likely to follow the Governor’s Office “Four Stages” and County Health guidance. County Health Officers guidance supersedes and is likely to be more restrictive than Governor’s guidance

We are not sure if our ridership will return to pre-COVID levels and cannot be certain how it might ramp up. We have expanded our budget model to include epidemiological and economic factors. We have developed two scenarios which include a decline in ridership that is between 5x and 15x more significant than our ridership decline during the Great Recession¹. We are continually updating our scenarios by surveying employers and riders to understand what will drive their return to work and the way they choose to get there

BART can be an enabler of economic recovery in the Bay Area by delivering safe and reliable service. Before COVID, 70% of our riders were commuters (including essential workers). We are exploring a range of COVID-19 related operating measures to keep our workforce and riders as safe as possible as the economy reopens

We are in regular communication with peer agencies to jointly problem solve how to navigate this unprecedented situation. We are sharing COVID-19 operating procedures, discussing how to best solve financial pressures, and sharing measures to increase passenger confidence in returning to transit

Our FY21 budget is under pressure because of the precipitous decline in fare revenue and additional COVID-19-related costs - it needs to be evaluated more frequently across a wider set of outcomes, given the uncertainty around the effectiveness of public health outcomes, the speed of economic recovery, and how quickly and to what extent our ridership will return to the system

¹ BART experienced a 5% decline in ridership in FY10

Budget summary

Uncertainty in both revenue and demand for service

- Wide range of possible outcomes - average FY21 ridership could range from 15% to 50% of pre-COVID and may not recover to 100% until FY23 or later
- Reductions in service could reduce spend by 10%, but could force 35% of riders off the system to support physical distancing
- BART's FY21 plan must be flexible:
 - Enhance service to support recovery / meet health standards
 - Maintain fiscal stability even if revenue recovery is slow

Sharply lower revenue

- Forecast revenue loss of up to \$600M: FY20 (up to \$180M) + FY21 (up to \$420M)
 - *CARES Act will offset only part of this loss*
- Public health guidance may limit per-car capacity for an extended period
- Impacts to fare revenue will last beyond FY21

Increased demands on resources

- PPE, disinfecting, and other operational strategies needed (FY21 Est. \$40-75M)
- Enhanced peak service required for physical distancing as ridership recovers

Additional fiscal support from state and federal governments will be required

COVID-19 response requires BART to balance multiple goals against its strategic goals

BART goals

Considerations for this discussion

Economy

How do we ensure BART supports the restart of the economy?

Equity

What level of service is necessary to fulfill our needs to essential workers and those that cannot work from home?

Environment

How can we encourage a more sustainable recovery with continued use of public transit?

Experience

What can we do to ensure that BART is a safe and healthy way to move around the region?

Performance

What level of service is needed to attract riders back onto the system?

Safety

How do we keep our workforce and customers safe and healthy?

Workforce

What workforce levels allow us to respond to changes in demand?

Financial stability

What tools do we have to address our likely operating gap?

Transit agencies are seeing unprecedented declines in ridership – and fiscal challenges

Agency

Current outlook

NJ Transit



“By April **the agency lost 98% of its ridership** and \$29 million in fare revenue, when only essential workers were riding the system, officials said Thursday”

MBTA



“[R]idership [has fallen] more than 90 percent on subways...The MBTA expects to fall short of its **revenue target by \$231 million this fiscal year**, a massive deficit...”

New York MTA



“The MTA **faces a shortfall of up to \$8.5 billion** even after temporarily scaling back service and receiving a \$3.8 billion federal bailout”

Chicago Transit Authority



“The CTA has reported a ridership decline of 80% compared with normal periods [and expects] a **\$551 million drop** [in revenue]”

LA Metro



“[In] recent weeks, ridership has plummeted by 70 to 80% [and] **losses will exceed anything [the agency] gets from the federal government.**”

SEPTA



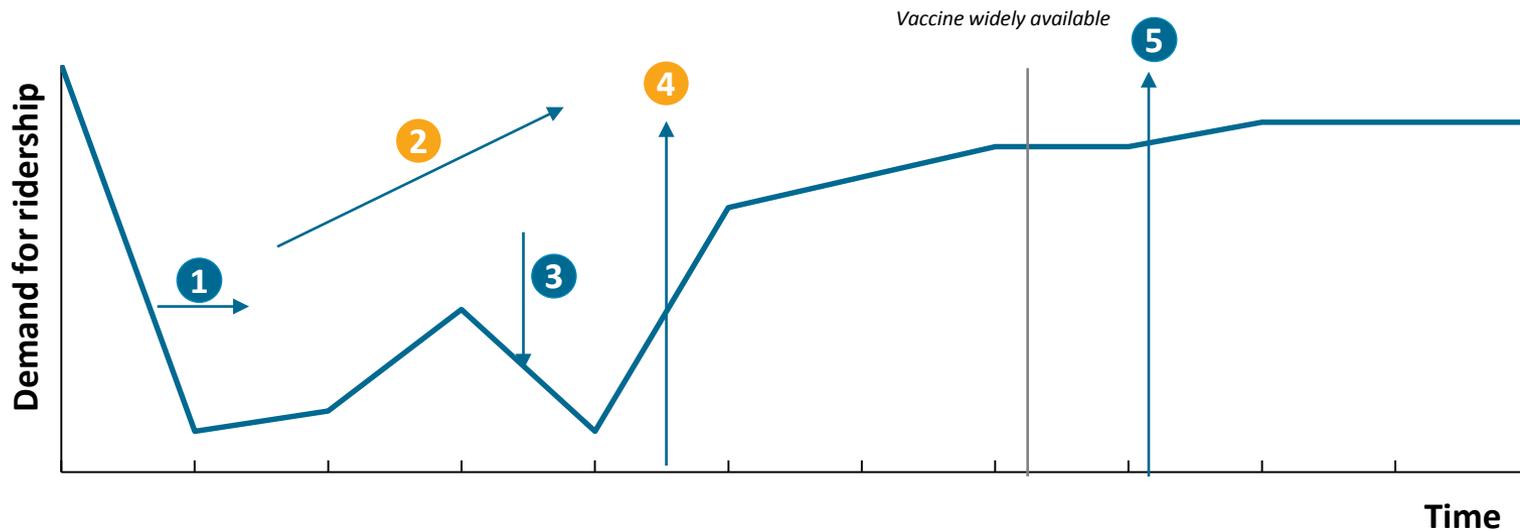
“SEPTA projects **at least a \$300 million loss of revenue through the end of June 2021** — a conservative estimate.”

BART has developed an outlook for ridership based on epidemiological and economic factors

Illustrative

Illustrative progression of ridership

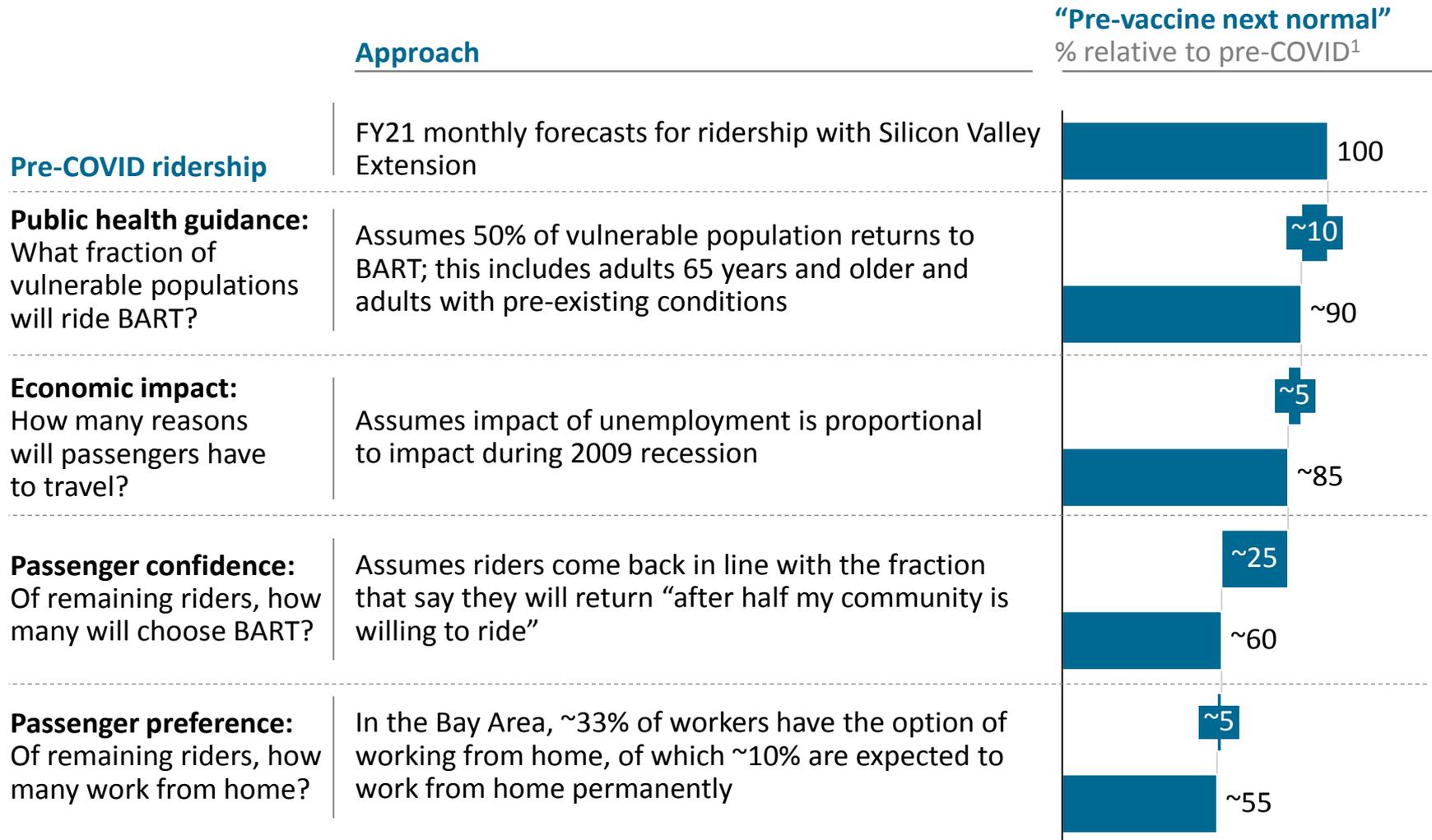
X Major driver for FY21 budget



Key questions

- 1 How deep is the trough?
- 2 What does ramp-up look like?
- 3 What is the impact of a potential viral resurgence?
- 4 What is the pre-vaccine next normal?
- 5 What is the post-vaccine next normal?

Ridership will depend on public health guidelines, economic recovery, and passenger sentiment

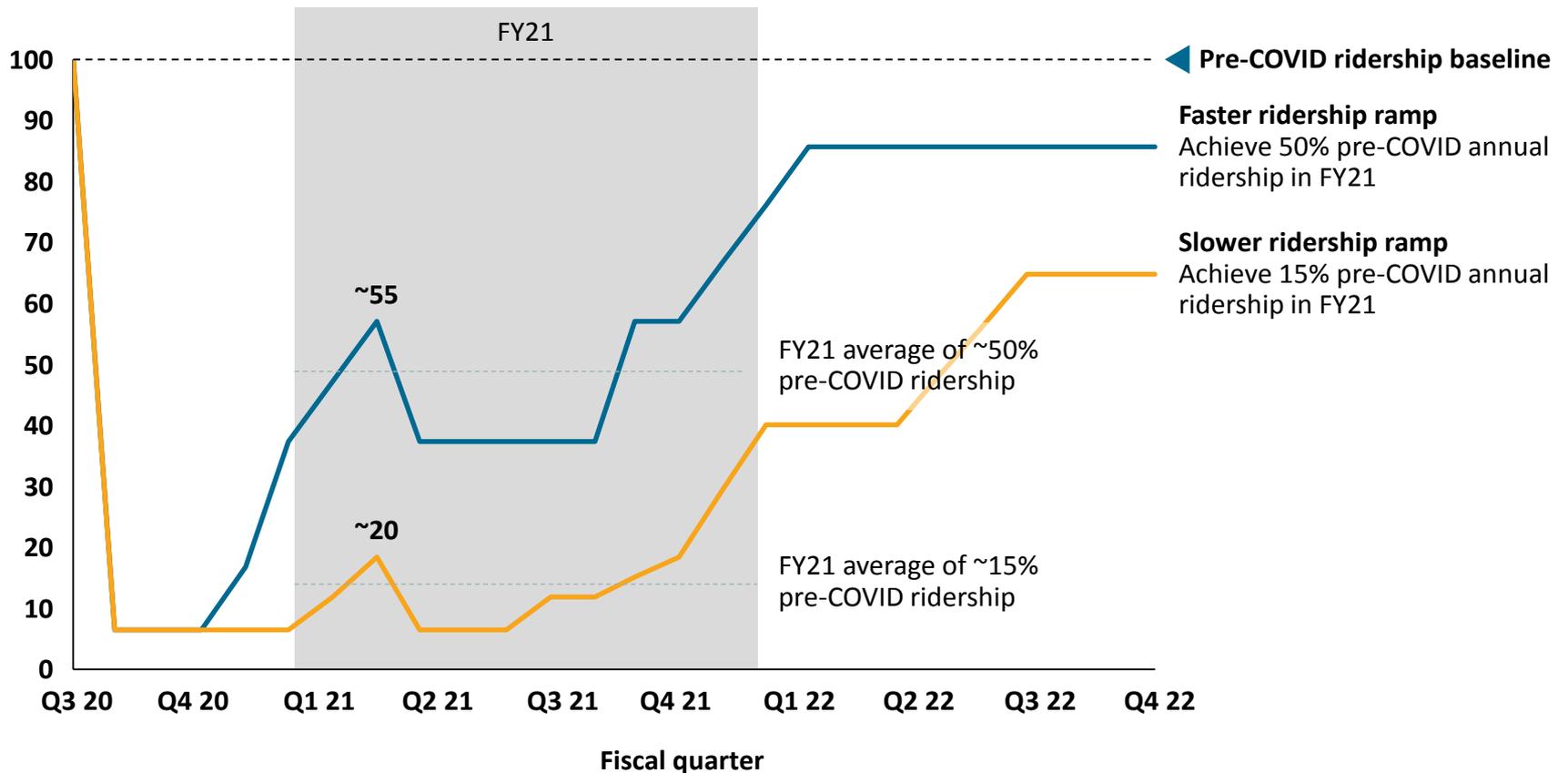


¹ Represents BART ridership before a vaccine is widely available – would be reached in Fall 2020 under “Faster Ramp” scenario

Source: BART FY2021 monthly ridership forecasts, BART rider segmentation survey data, BART historical monthly ridership, Oxford Economics unemployment projections, Bureau of Labor Statistics historical unemployment, BART ridership data, COVID 19 Consumer Survey April 2020, Oxford economics jobs by industry in Bay Area counties, Slack HQ, Gartner, KFF

Average annual ridership in FY2021 could range from 15% to 50% of pre-COVID demand

Ridership, % of pre-COVID



Source (timing): SF.gov, San Francisco public health department and the California Department of Public Health, SF Chronicle, pharmaceutical company press releases, Center for Disease Control, New York State press coverage, FDA guidance, White House press conferences, World Health Organization

Source (scale): BART FY2021 monthly ridership forecasts, BART rider segmentation survey data, BART historical monthly ridership, Oxford Economics unemployment projections, Bureau of Labor Statistics historical unemployment, BART ridership data, Consumer Survey April 2020, Oxford economics jobs by industry in Bay Area counties, Slack HQ, Gartner, KFF



State guidance for transit agencies is “physical distancing to maximum extent”

Current guidelines and practice on physical distancing

California guidance for public transit as of May 7, 2020¹

Key prevention practices include:

- Physical distancing to the maximum extent possible
- Reducing maximum occupancy onboard transit and rail vehicles to support physical distancing
- Where possible, using additional buses or transit vehicles to support “excess” demand

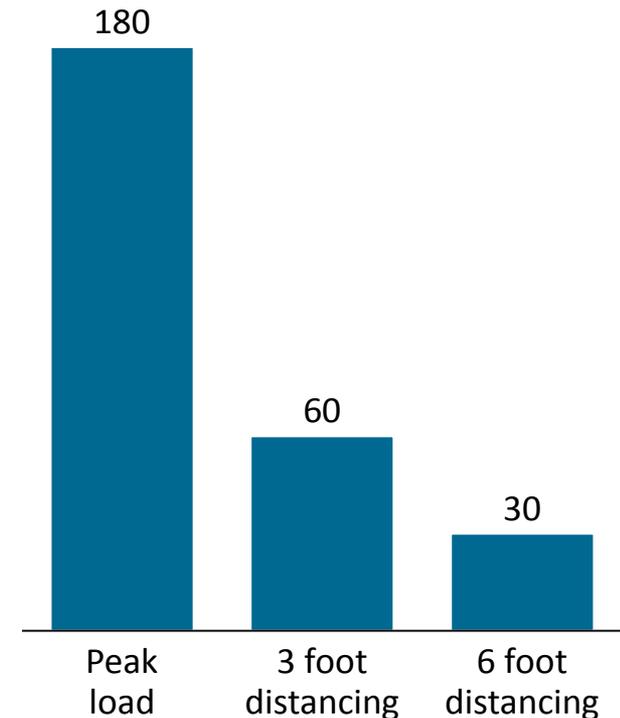
Current US commercial airlines distancing practice²

American Airlines: Effort made to assign only 50% of main cabin middle seats (provides 1.5-3 feet distancing) and will only assign those seats “when necessary”

Delta Airlines: No middle seat (1.5-3 feet)

United Airlines: Effort made for no middle seat (1.5-3 feet) but “cannot guarantee all passengers will be next to unoccupied seat”

Car capacity under distancing options, Passengers/car³

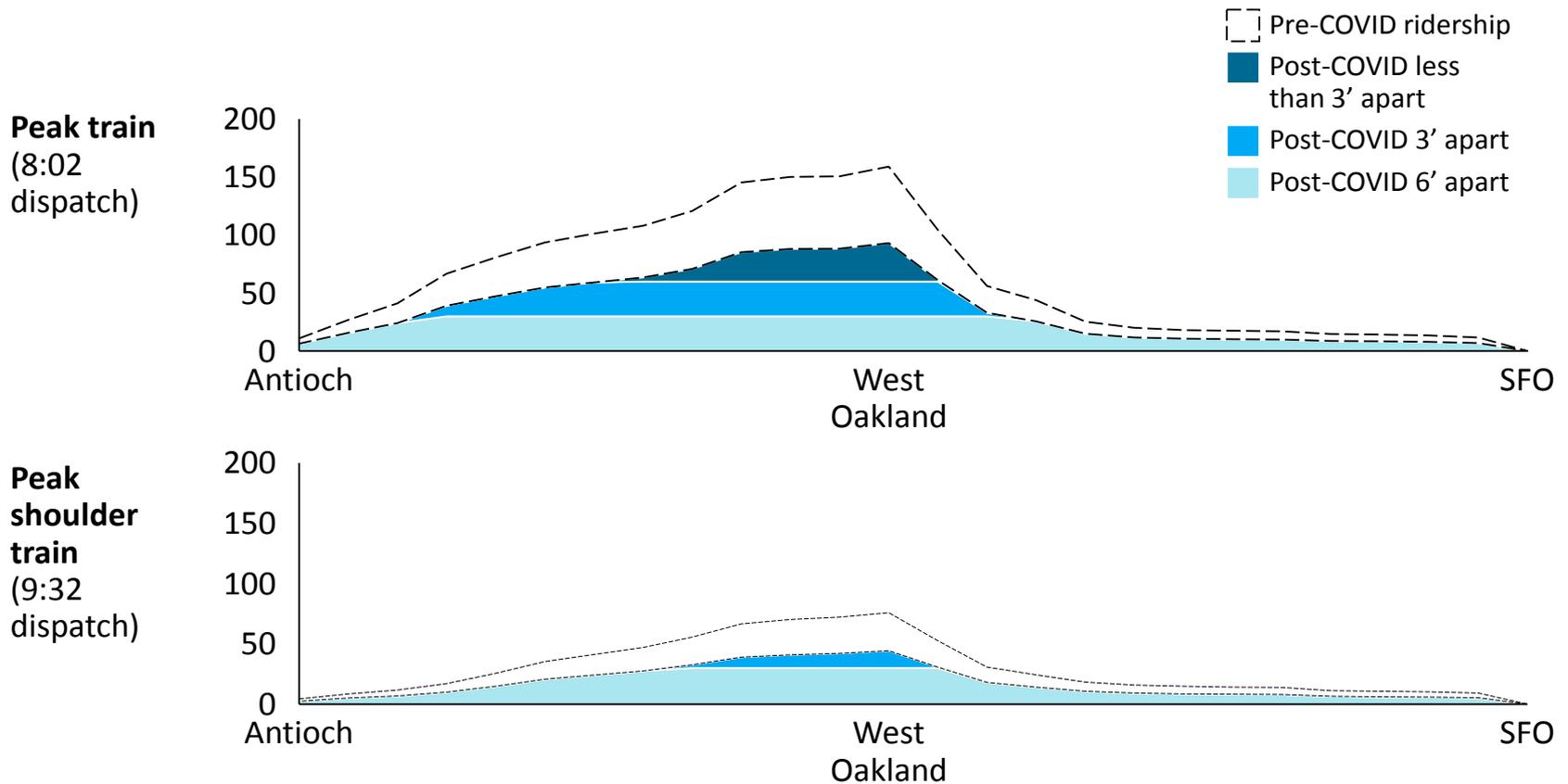


1 COVID-19 Industry Guidance: Public Transit and Intercity Passenger Rail, May 7, 2020 2 “Flying During Corona Virus,” Conde Nast Traveler May 5 2020 and SeatGuru for economy-class seats on long-haul flights 3 Based on pre-COVID passenger loads and BART operations review of vehicle geometry

Source: BART Operations, press search, Washington Post, Centers for Disease Control, Conde Nast, airline websites, Star Telegram, ABC

At 50% ridership, physical distancing may impact our ability to serve passengers during the peak

Yellow Line westbound loadings under physical distancing, average passenger load per car¹



¹ Snapshot from September FY 2021 under "Faster ramp" scenario

Source: BART Operations; PFM system

BART could set a range of targets for physical distancing

■ Current practice

Possible options through
End of Shelter-in-Place
Order¹

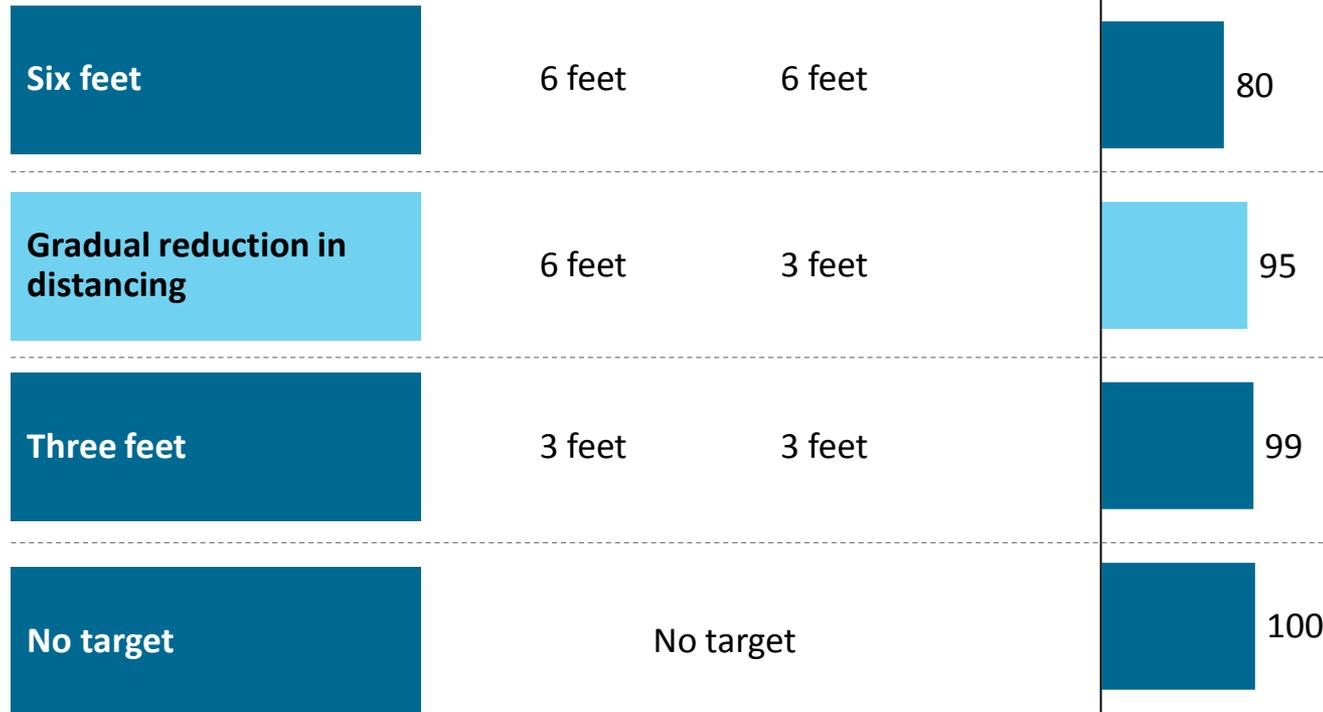
Distance by stage of recovery

Stage 2¹

Stage 3¹

% of demand served²
% of passengers

Key questions to
understand



- How to best comply with state guidance?
- How to gain the confidence of our riders?
- What will each target mean for managing passenger flows?

¹ Aligns with Stage 4 of California Resilience Roadmap and assumes Faster Ramp scenario, with Reduced Peak and Early Close service level. Under these scenarios, Stage 2 would last through August and Stage 3 would last through February

² Under "Faster Ramp" scenario and "Reduced Peak and Early Close" service level

Source: BART Operations; PFM system, California Department of Public Health

In addition to distancing, BART is considering an array of other COVID-related operating measures

- Across the world, there are **widely varying sets** of health policy guidelines, alongside **varying levels of enforcement**
- There is **no one answer** for how public transit systems should respond to COVID-19, though some type of increased cleaning has been universally implemented
- Beyond simply adhering to health policy guidelines, it is critical for public transit systems to put in place interventions that **increase passenger confidence and safeguard customers and staff**
- Most variation between systems is seen on:
 - PPE and testing for passengers
 - Enforcing physical distancing and new norms

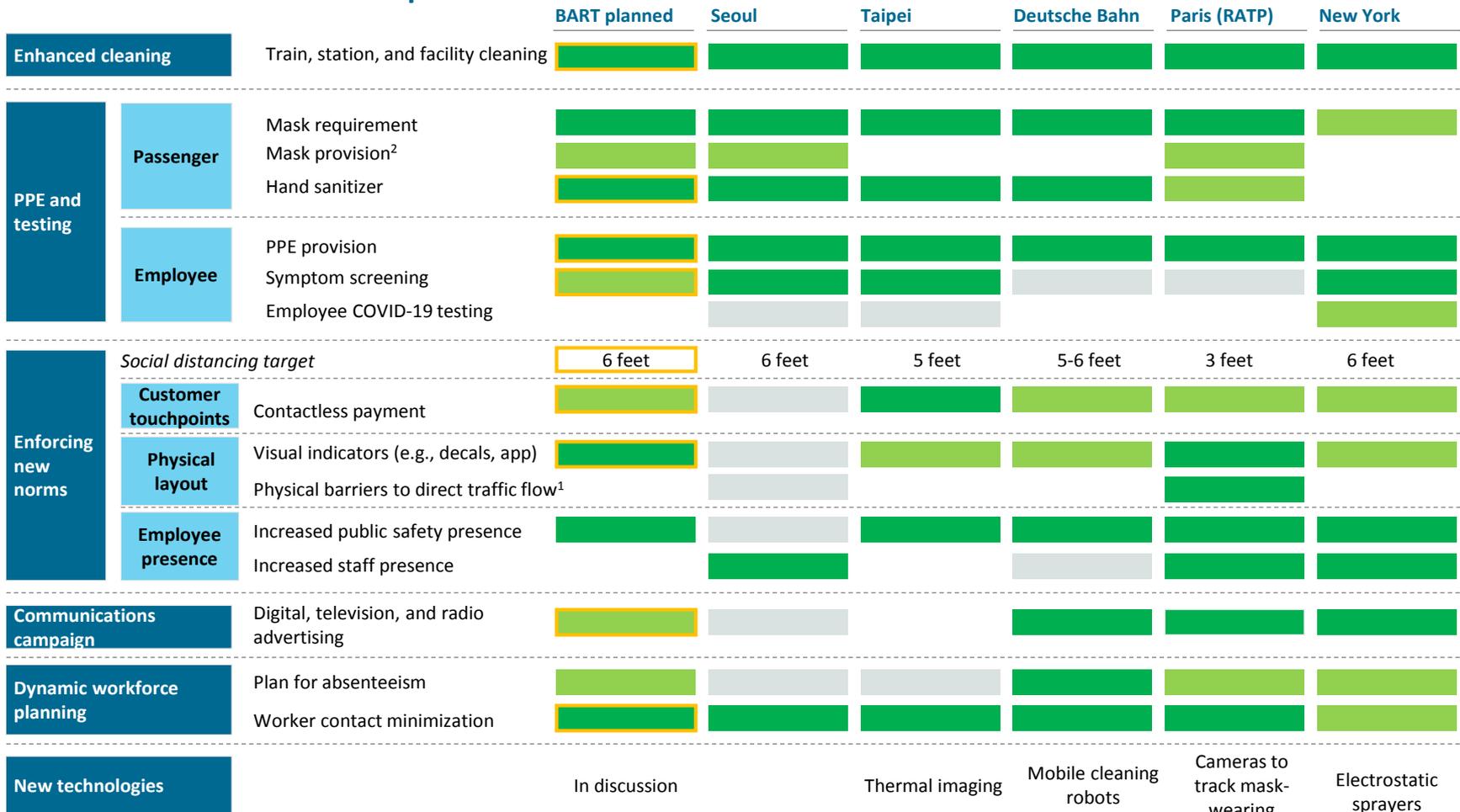
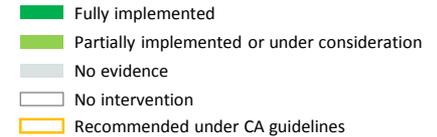
BART is evaluating a range of COVID-19 operating measures

Examples of COVID safety measures

Enhanced cleaning regimens		Disinfecting and more frequent cleaning of trains, stations and facilities
PPE and testing	Passenger	PPE, hand sanitizer provision, and temperature checkpoints
	Employee	PPE and hand sanitizer provision, COVID testing, and temperature checkpoints
Enforcing new norms	Customer touchpoints	Visual ticket inspection and protective barriers
	Physical layout	Visual indicators and barriers to direct passengers
	Employee presence	Increase public safety and station agent presence
Communications campaign		Digital, television, and radio advertisement
Dynamic workforce planning		Plan for absenteeism and staffing changes to minimize staff contact
New technologies		Thermal imaging cameras, UV light cleaning, mobile cleaning robots

- All measures to **comply with latest public health authority guidance**
- Initial estimates indicate a range from **\$40M to \$75M for annual cost** of measures

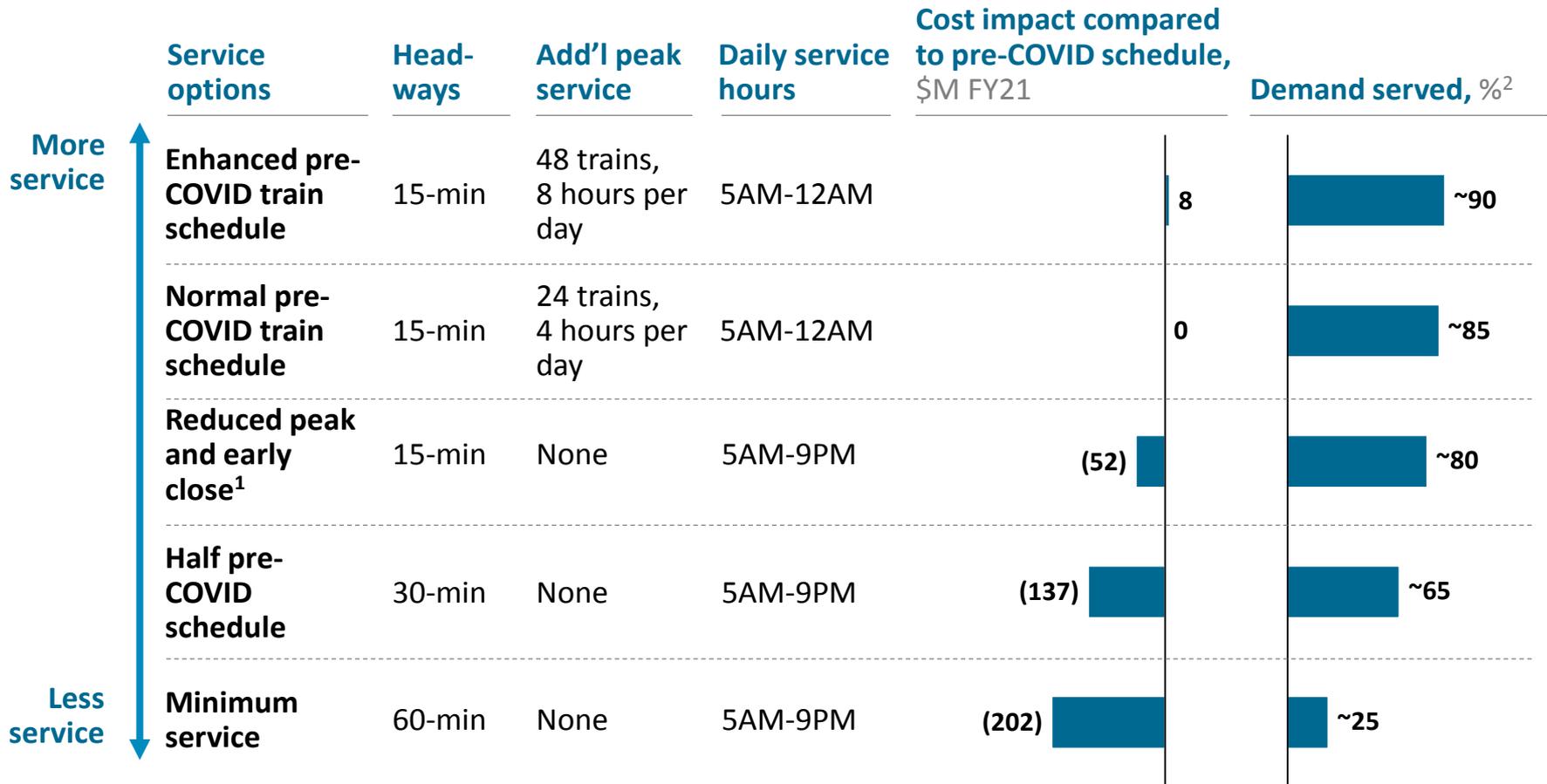
A wide range of international responses to COVID-19 operation measures exists



¹ California guidelines recommend either visual indicators or physical barriers to direct traffic flow ² BART currently providing donated masks at some stations
 Source: International Association of Public Transport, "COVID-19 Industry Guidance: Public Transit and Intercity Rail," California Department of Health, CalSTA, CalOSHA, May 2020, Seoulmetro.co.kr, Mediapub.go.kr, Korea Herald, Metro.Taipei, Taiwan News, Taipei Times, Storm Media, Deutschebahn.com, Taggeschau, RBB24, General-Anzeiger,, Gothamist, MTA, NY Post, The Guardian, The Verge, Moovit, Expert interviews



While service reductions could reduce expenditures by 15%, BART may only be able to meet 65% of rider demand



1 In line with June bid staffing levels 2 Assumes 6' physical distancing across all service options and Faster Ramp scenario

Source: BART O&M Cost Model, BART PFM Database, Center for Disease Control

Given projected demand and increased COVID costs, we evaluated several service plans

FY21 (\$M)	Potential Service Plans				
	Minimum service	Half pre-COVID schedule	Reduced peak and early close	Normal pre-COVID schedule	Enhanced pre-COVID schedule
Routes	3	5	5	5	5
Headways	60	30	15	15 (+rush trains)	15 (+ add'l rush trains)
Hours of Service	5am-9pm	5am-9pm	5am-9pm	5am-12am	5am-12am
Peak Cars	219	431	609	709	709
Peak Trains	22	44	62	72	72
Total Car Miles (M)	17.1	45.0	82.3	92.1	95.6
Budget (Total Uses of Funds) (\$M)	\$725	\$790	\$875	\$927	\$934
Budget Delta (\$M)	(\$202)	(\$137)	(\$52)	-	\$8
<i>% Change from Pre-COVID Schedule</i>	<i>(21%)</i>	<i>(16%)</i>	<i>(4%)</i>	-	<i>1%</i>
Total FTEs	2,531	2,868	3,334	3,585	3,616
FTE Difference	(1,054)	(717)	(251)*	-	31
<i>% FTE Change from Pre-COVID Schedule</i>	<i>(29%)</i>	<i>(20%)</i>	<i>(7%)*</i>	-	<i>1%</i>

* Vacant positions only; FTEs in this scenario reduced through inactivating vacant positions

Source: BART Performance and Budget



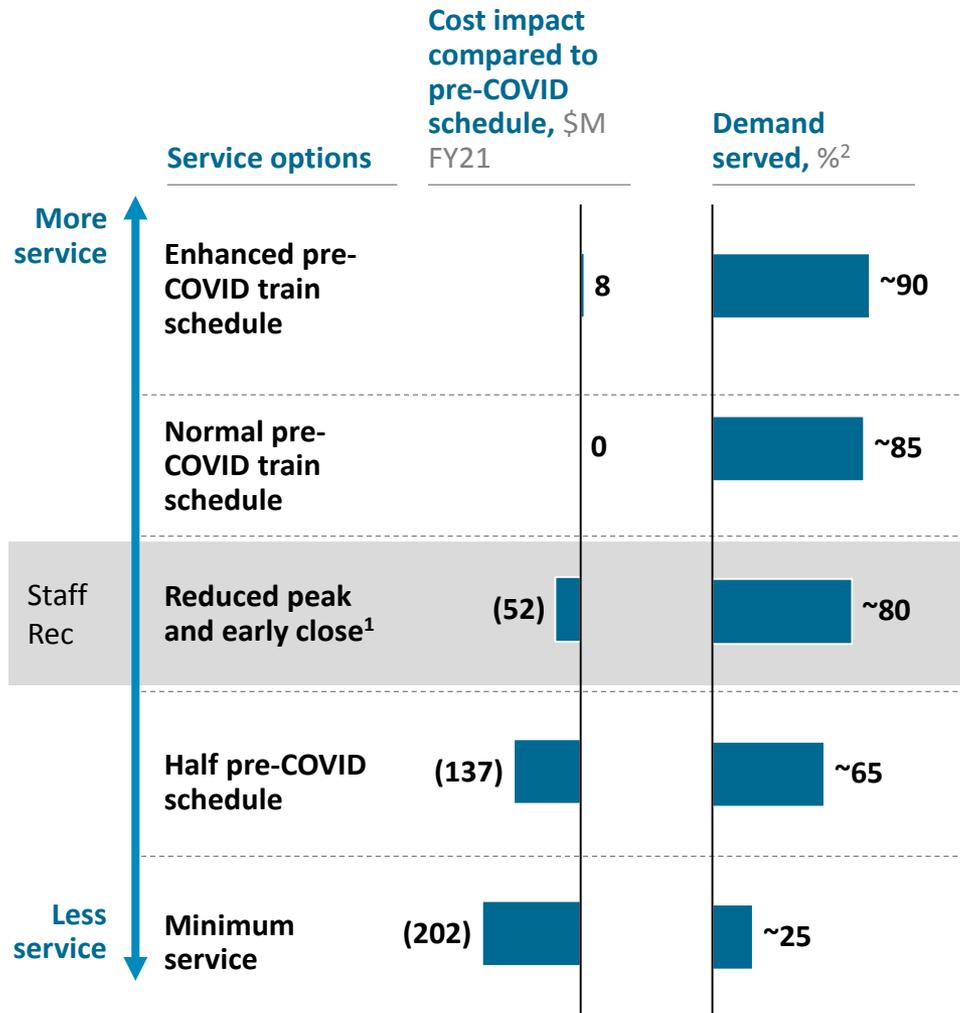
From these we developed 3 options...

FY21 Working Income Statement	Option A	Option B	Option C
Service Level	Half pre-COVID schedule	Reduced peak and early close	Enhanced pre-COVID service
Revenue Scenario	Slower ramp	Midpoint	Faster ramp
Sources (\$M)			
Fare revenue	69	145	222
Capacity constraint	(4)	(4)	(18)
Parking	5	10	16
Other operating	27	29	31
Sales tax proceeds	226	239	252
SFO & SVBX assistance	83	75	71
Other assistance	118	119	119
Total Revenues	525	614	693
CARES tranche 1 (FY20 remainder)	75	75	75
CARES tranche 2 (targeted)	164	164	164
Total Sources	764	853	932
Uses (\$M)			
Labor & benefits	540	601	628
Power	40	48	56
Non-labor	146	162	168
Debt Service	47	47	47
Allocations	17	17	28
COVID expenses (estimate)	75	75	75
Total Uses	865	950	1,002
Net Result	(101)	(97)	(70)
Net Result less CARES Tranche 2	(265)	(261)	(234)

Source: BART Performance and Budget



Staff recommendation



- Begin FY21 Q1 with budget for with **'Option B: Reduced Peak and Early Close'**
 - Staffing/expense budget supports 15 min peak headways on each line and COVID 19 response
 - July service schedule will likely begin with 30 min headways, but with staffing available to scale up to 15 min headways as required
- Make case to **regional partners, Sacramento and Washington** that the Bay Area needs more BART service to meet public health and economic recovery goals; **pursue additional emergency funding**
- Monitor **new information**:
 - Pace of ridership/fare revenue recovery
 - Pace of economic recovery
 - Public health mandates (added expense)
 - CARES Act second tranche allocation
- If demand and revenue are **low**, be prepared with strategies to **maintain fiscal stability**:
 - Implement **'Option A: Half Pre COVID Schedule'** (Requires reductions in force / furloughs)
 - Reverse prior year capital allocations
 - Consider prudent use of reserves
- If demand is **high**, be prepared with strategies to **serve the region**:
 - Plan to **scale up to 'Option C: Enhanced pre-COVID Service'**
 - Prepare operations and access strategy to **spread peak and manage loads** to maximize available peak capacity

1 In line with June bid staffing levels 2 Assumes 6' physical distancing across all service options and Faster Ramp scenario

Source: BART O&M Cost Model, BART PFM Database, Center for Disease Control



FY21 Budget – budget checkpoints

Planned Dates	Topic
June 25	Budget Adoption
July 1	FY21 Begins
October Meeting	Q1 Budget Update, Checkpoint <u>Assess changes to:</u> Pace of ridership/fare revenue recovery Pace of economic recovery Public health mandates/added expense CARES Act 2 nd tranche allocation
January Meeting	Q2 Budget Update, Checkpoint
April Meeting	Q3 Budget Update, Checkpoint

Appendix

FEMA Public Assistance

Summary of Category B items

Management, control and reduction of immediate threats to public health and safety

- Emergency Operation Center costs
- Training specific to the declared event
- Disinfection of eligible public facilities
- Technical assistance to state, tribal, territorial or local governments on emergency management and control of immediate threats to public health and safety

Emergency medical care

- Non-deferrable medical treatment of infected persons in a shelter or temporary medical facility
- Related medical facility services and supplies
- Temporary medical facilities and/or enhanced medical/hospital capacity
- Use of specialized medical equipment
- Medical waste disposal
- Emergency medical transport

Medical sheltering

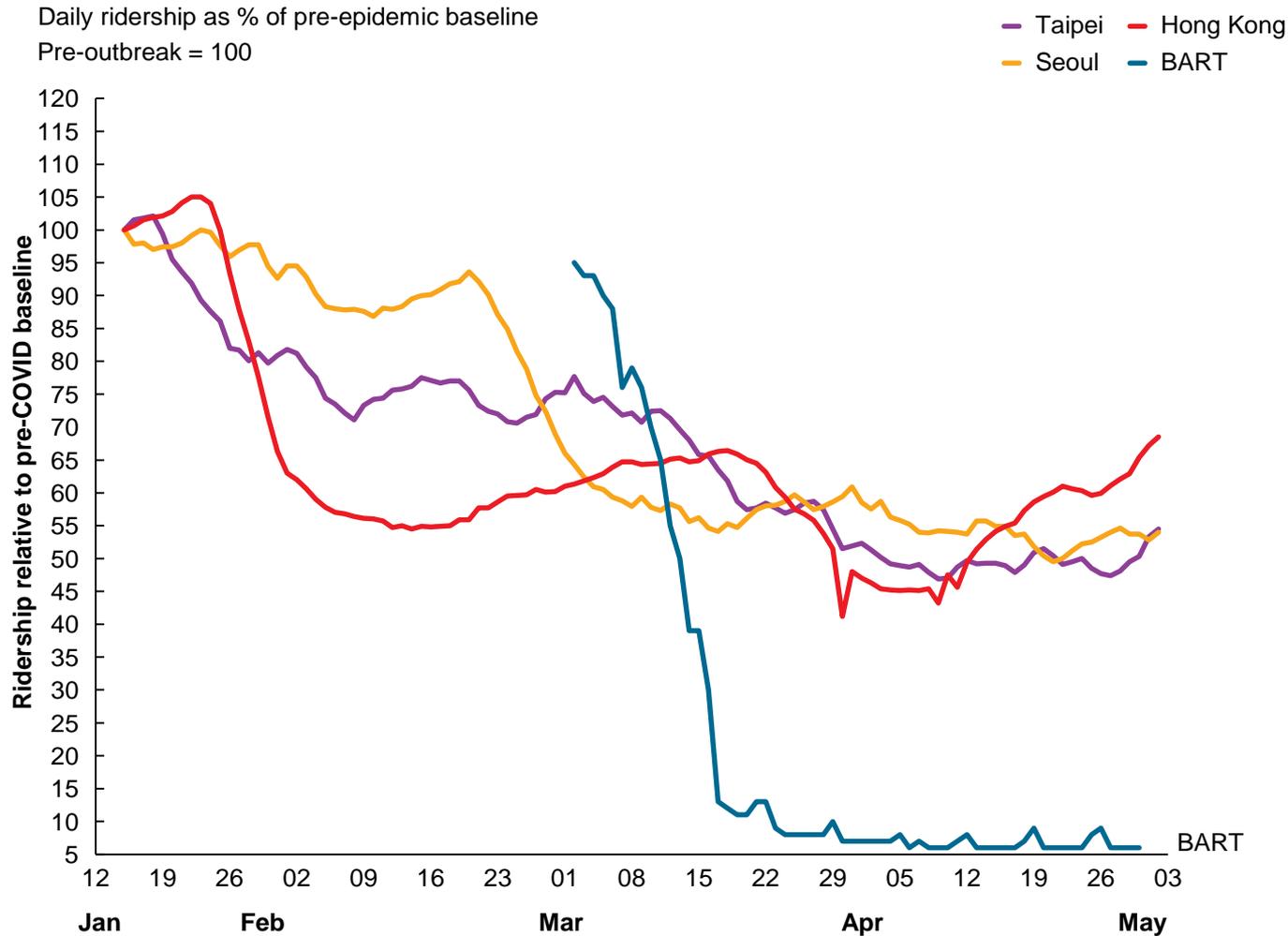
- All sheltering must be conducted in accordance with standards and/or guidance approved by HHS/CDC and must be implemented in a manner that incorporates social distancing measures
- Non-congregate medical sheltering is subject to prior approval by FEMA and is limited to that which is reasonable and necessary to address the public health needs of the event, is pursuant to the direction of appropriate public health officials and does not extend beyond the duration of the Public Health Emergency.

Other items

- Household pet sheltering and containment actions
- Purchase and distribution of food, water, ice, medicine, and other consumable supplies, to include personal protective equipment and hazardous material suits movement of supplies and persons.
- Security and law enforcement
- Communications of general health and safety information to the public.
- Search and rescue to locate and recover members of the population
- Reimbursement for state, tribe, territory and/or local government force account overtime costs

- FEMA currently reimbursing COVID-19 measures under category B of Public Assistance
- BART staff is working with State government to determine which expenses are reimbursable
- Window for reimbursement will close at a point determined by the Federal government
- Staff understands that reimbursable categories include:
 - Facility disinfection
 - Purchase and distribution of commodities (e.g., PPE, gloves)
 - Emergency Operations Center
 - COVID-related communications

Ridership decrease in Asia has not been as sharp - health crisis and measures have been less severe

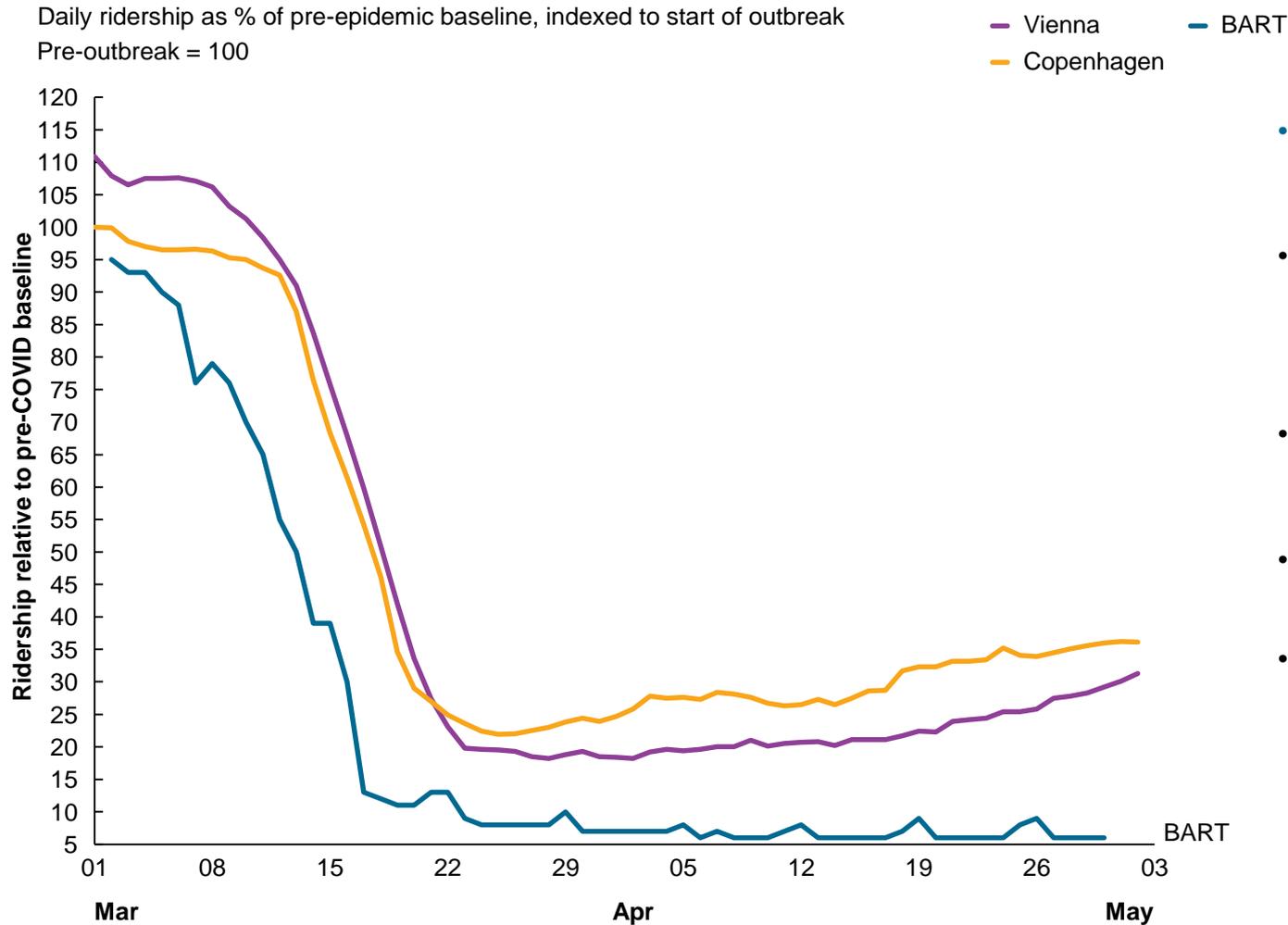


- **Taiwan** has 440 COVID-19 cases and 6 COVID-19 deaths; **South Korea**, 10822 cases and 256 deaths; **Hong Kong**, 1045 cases and 4 deaths
- These countries have had less severe lockdowns and have used public health experience from the 2003 SARS epidemic
- **Ridership has been slower to ramp back up in Taipei and Seoul** than it has been in Hong Kong
- Non-BART data is from Moovit app usage, not official agency statistics

Source: Moovit, BART, Johns Hopkins University, Worldometer



Ridership decrease in Europe has been sharp, though recent signs of improvement



- **Austria** has 15,774 COVID-19 cases and 614 COVID-19 deaths; **Denmark**, 10,416 cases and 522 deaths
- European systems that have suffered similar declines in ridership to BART have **already shown improvements in ridership** as lockdowns have eased
- Vienna has climbed from a trough of ~20% ridership relative to pre-COVID baseline in late April to ~30% today
- Copenhagen has climbed from a trough of ~20% in late April to ~35% today
- Non-BART data is from Moovit app usage, not official agency statistics

Source: Moovit, BART, Johns Hopkins University

