



# INDIA CYCLES 4 CHANGE CHALLENGE

*Ahmedabad*



# **Presentation for Workshop 4**

Ahmedabad

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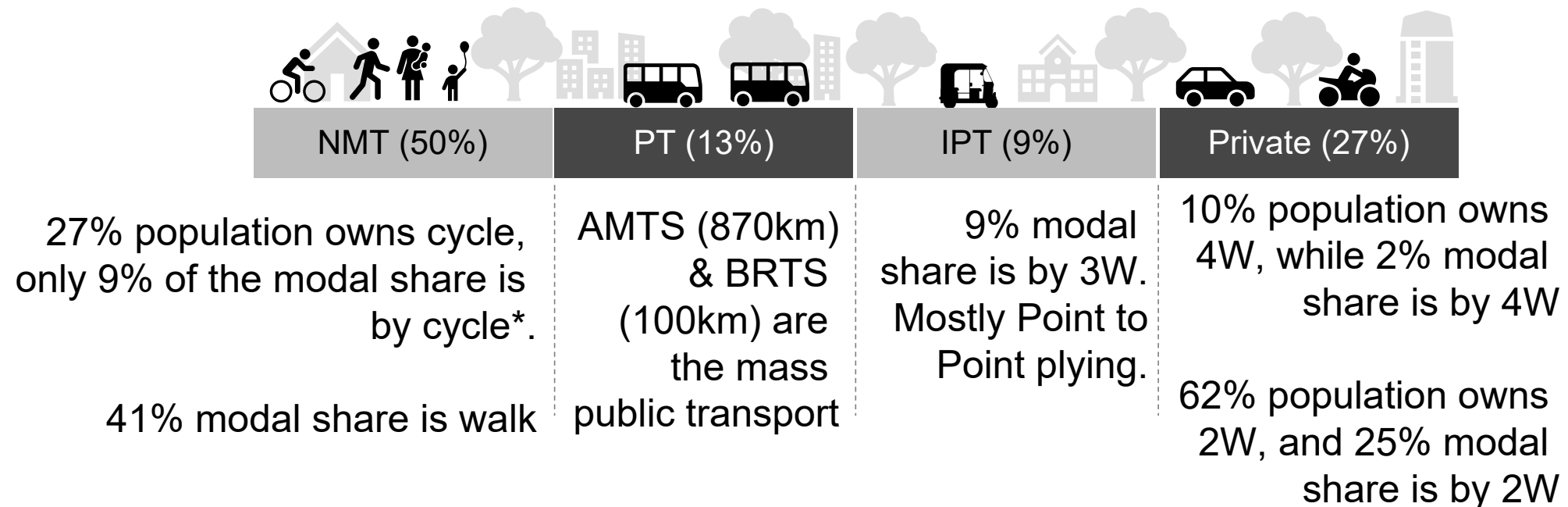


**D. Our Proposed Intervention for Pilot**

# Ahmedabad City and Importance of NMT

The city of Ahmedabad has estimated 71lakh population spread in 446sqkm area. People moves across the city's ring radial road network and accounts for an average trip length is 5.2 km/person.

## Our primary commuters in city are NMT commuters



The data is of 2012. **Post 2012 city has invested in expanding existing PT system, implementing Metrorail (ongoing construction) , \*already implemented PBS system with cycles & e-bikes...**

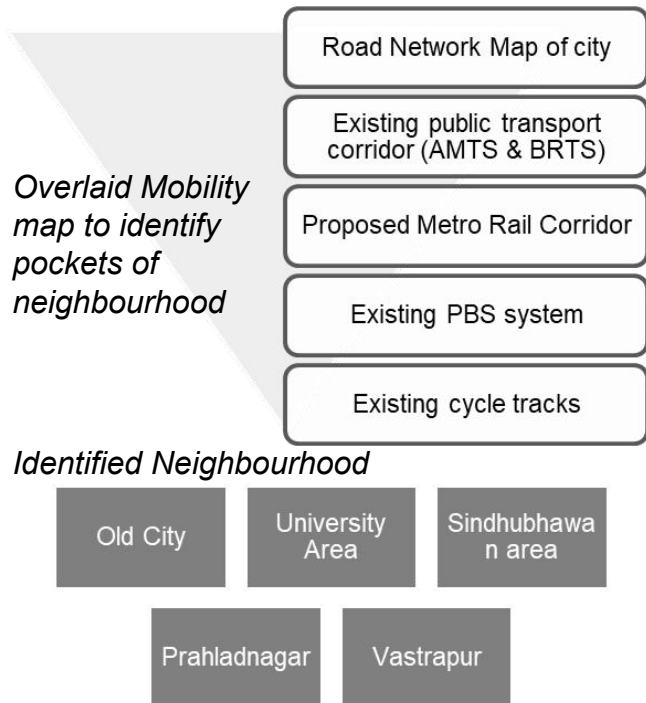
# Strategy for Selecting Neighborhood for Handlebar Survey & Pilot..(1/3)

The city appointed C4C Committee members comes from diverse background & has varied expertise. They all came together, to assess the pros & cons and shortlist (1) neighborhood based on the 3-step process.

**Step 1: Identify the neighbourhoods**

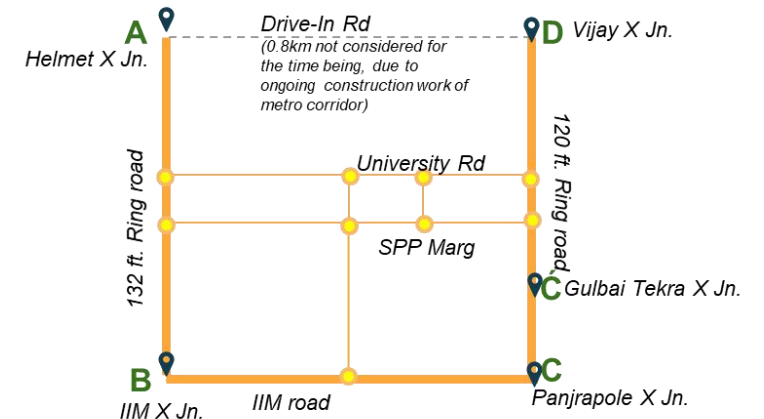
**Step 2: Define parameters to assess the neighbourhood**

**Step 3: Shortlist the most suited neighbourhood**



	<b>Location</b>	Commuter type   Existing PT   Existing PBS
	<b>Road</b>	Width(RoW)   Traffic Lanes   Pavement type & condition   Existing Infrastructure
	<b>Traffic</b>	Traffic Volume & Speed for perception of Safety
	<b>Environment</b>	Perception of security   adjacent land-use   Presence of trees along the roads for natural shade   Street lighting
	<b>Route</b>	No. of roundabouts/intersections   Intersection signalisation   Physical barriers

Graphical representation of the selected corridor for Handlebar survey:  
**University Area**



# Strategy for Selecting Neighborhood for Handlebar Survey & Pilot..(2/2)

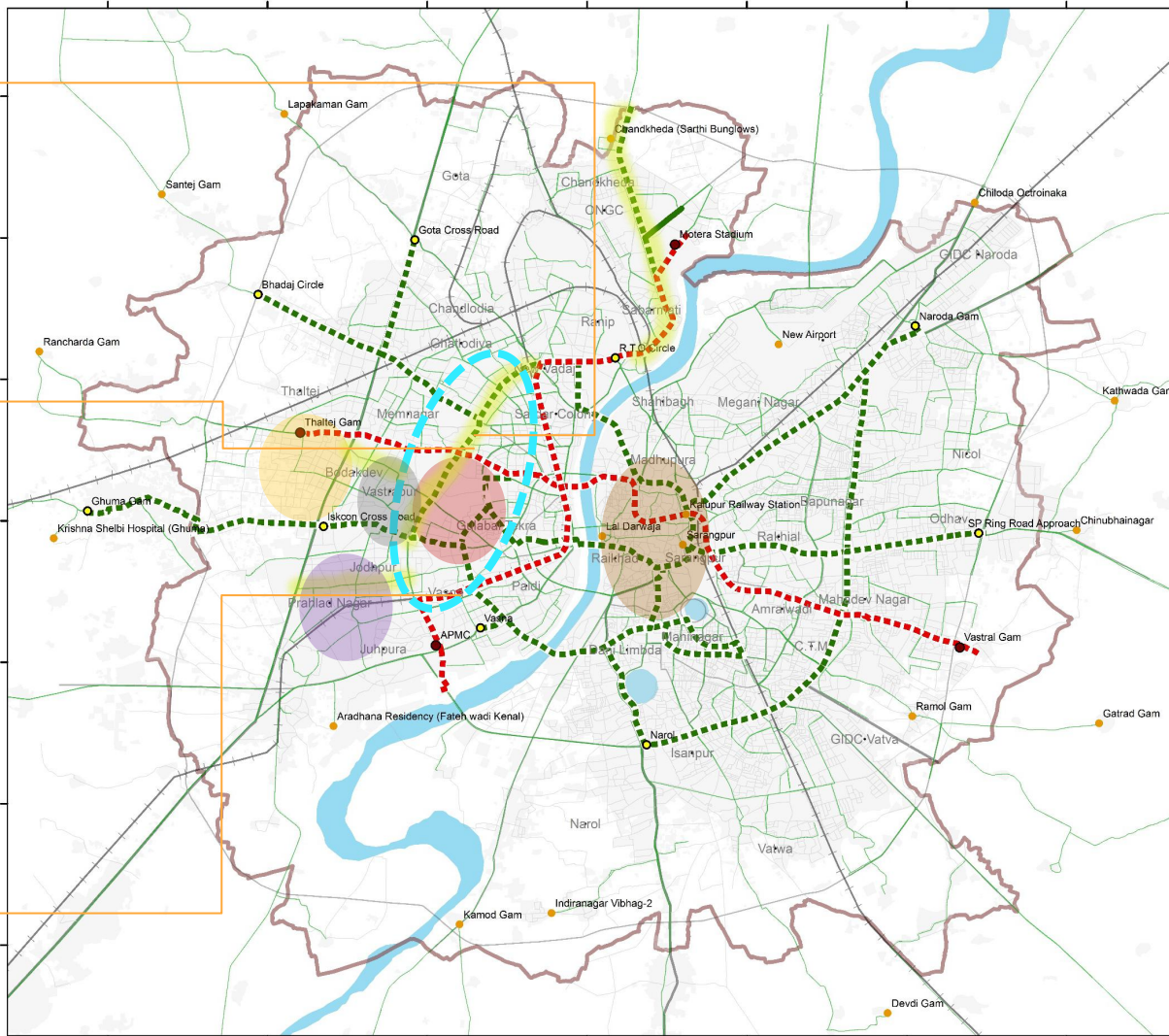
Step 1: Overlay mobility map & identify the neighbourhoods

From the identified five neighborhoods, three neighborhoods have cycle track. **Recce survey** was done by committee member in those three neighborhoods...

1. University Area  
Helmet X rd- IIM X Rd  
1.4 km of concrete cycle track of 2.25mt width

2. Vastrapur Area  
Gurudwara to Vastrapur  
Newly built 2.8km (1.4km each side) concrete cycle track of 1.8mt width

3. Prahladnagar  
Shyamal Junction to Prahladnag Cross road  
Newly built 2.9km paver block cycle track of xxmt



**Identified Pockets for NMT intervention**

- Old City
- University area
- Sindhu bhawan Marg
- Prahladnagar
- Vastrapur
- Cycle track
- PBS -Amdabike

● Metro OD Stops  
● BRTS Stops  
● AMTS Stops  
--- Metro Corridor(Under Construction)  
--- BRTS Network  
--- AMTS Network  
--- Railway

**Road Network**

- NH (In Arterial)
- SH (In Arterial)
- Arterial
- Subarterial
- Other Roads
- Builtup
- AMC Boundary
- Waterbody

Map Title: Existing Public Transport Network

Scale: 0 1.25 2.5 5 Km






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# Strategy for Selecting Neighborhood for Handlebar Survey & Pilot..(3/3)

Further several parameters were taken into consideration to narrow down to selecting university area for pilot interventions. The considered parameters & rationales are;

Parameters		Rationale for selecting <b>University Area</b>
 <b>Location</b>	Commuter type   Existing PT   Existing PBS	<ul style="list-style-type: none"> <li>Mixed User: Student pop., PT users.</li> <li>Proximity to PT: BRTS, AMTS, upcoming metro-rail</li> <li>Access to Amdabike (PBS) stations</li> </ul>
 <b>Road</b>	Width(RoW)   Traffic Lanes   Pavement type & condition   Existing Infrastructure	<ul style="list-style-type: none"> <li>Wide roads- 40mt; 36mt (ring rd), 24mt radial rd</li> <li>Concrete pavement</li> <li>Existing 2.8km cycle lane in 40mt ring road</li> </ul>
 <b>Traffic</b>	Traffic Volume & Speed for perception of Safety	<ul style="list-style-type: none"> <li>Busy road with dedicate lane for BRTS</li> <li>Flyover carries the highspeed thoroughfare traffic making the at-grade less congested</li> </ul>
 <b>Environment</b>	Perception of security   adjacent land-use   Presence of trees along the roads for natural shade   Street lighting	<ul style="list-style-type: none"> <li>Highly active area, trees planted, provision of street lights</li> <li>Access to universities, hostels, commercial stretches, Blind People Association, offices, residences and market place</li> </ul>
 <b>Route</b>	No. of roundabouts/intersections   Intersection signalisation   Physical barriers	<ul style="list-style-type: none"> <li>5 major junctions (also cross junction) &amp; 9 T-junctions</li> <li>Currently on-going metro work near helmet is the only barrier</li> </ul>

# Handlebar Survey - Overview

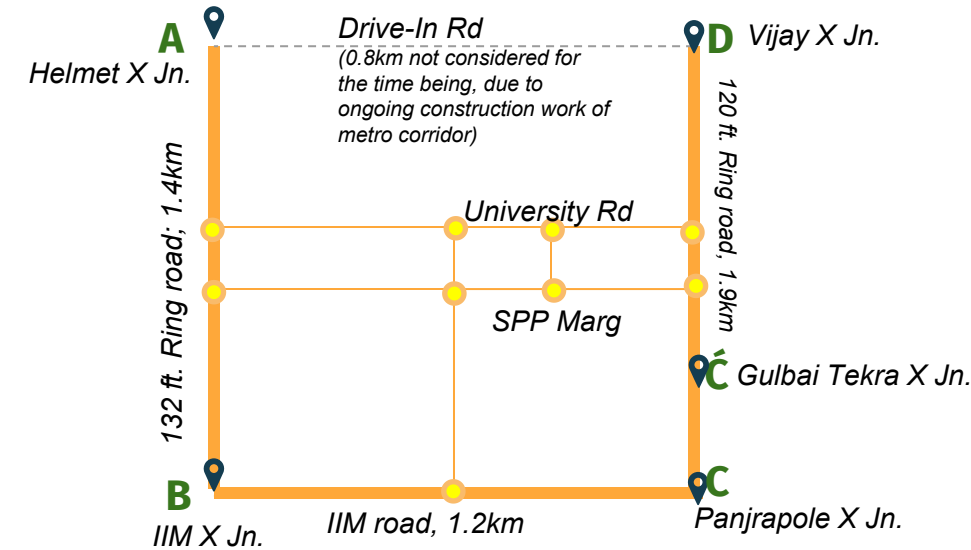
## Corridor

1. Name of the roads: 132ft Ring Road (Helmet Cross Junction to Andhjanmandal; 1.4km)- IIM Road(IIM to Gulbai Tekra; 1.2km)- 120ft Ring Road (Gulbai Tekra to Vijay Cross road; 1.9 km) - via SPP Marg (neighborhood road connecting 120ft Ring road to IIM Road) & University Road (neighborhood road connecting ring roads)
2. Length: 8.3 km

## Neighbourhood

1. Name: University Area
2. Area: Approx. 2 sqkm

Graphical representation of the corridor

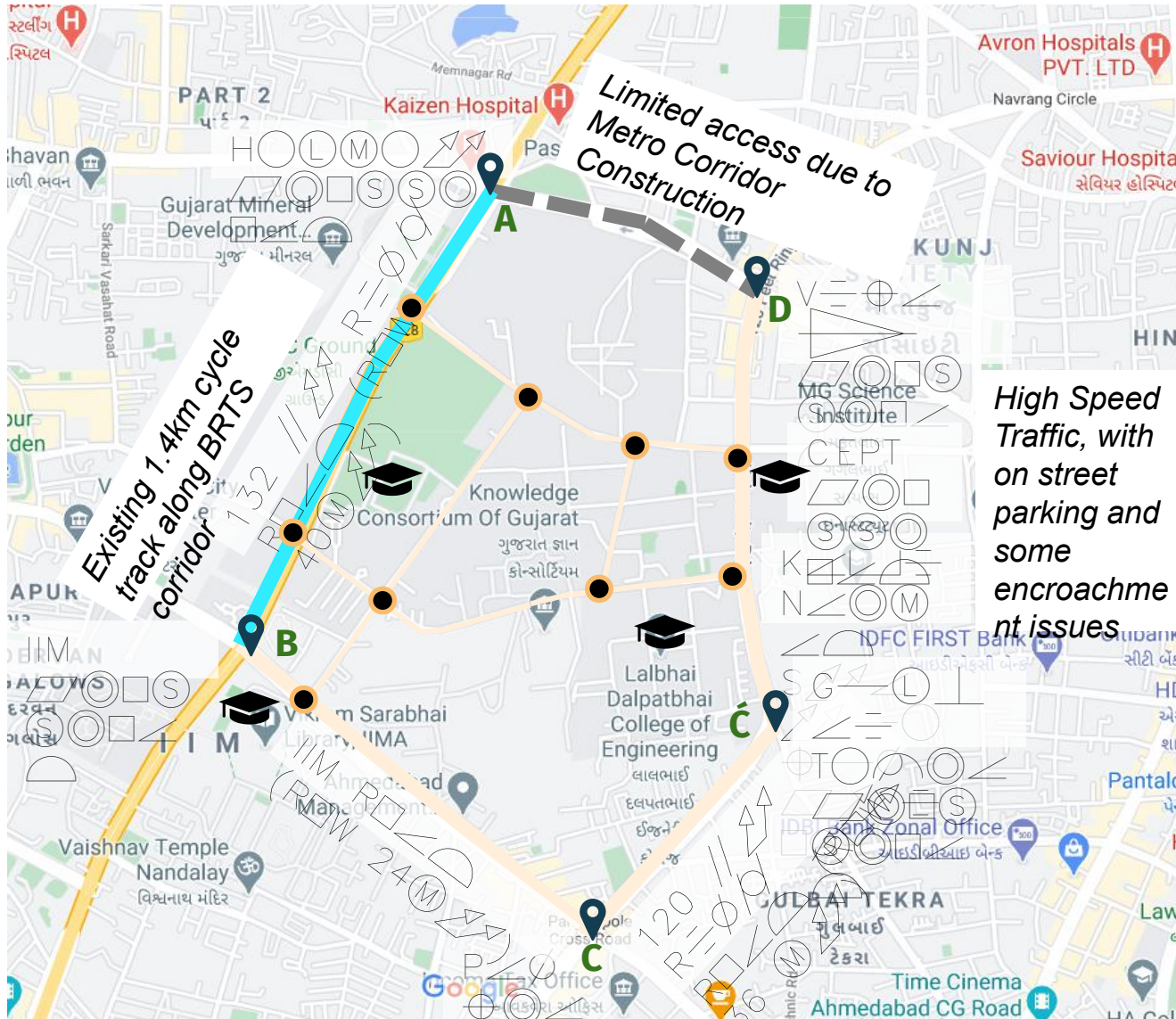


Team	1st Survey	2nd Survey
Team Composition	Shri. Nitin Sangwan (IAS); Shri. Rushi Panya; Arjit Soni; Nikita Lalwani; Vinod Purohit; Jignesh Patel; Dattarey Patel	Prof. Abhijit Lokre; Shelly Lokre; Nikita Lalwani, Purvi Bhatt; Arjit Soni
Type of Participants	CEO Smart City, Govt. Officer, Transport Planner, Architects, Urban Designer, Seasoned and beginner cycle enthusiast, Cycle Operator	Transport Planner, Architects, Urban Designer, Seasoned and beginner cycle enthusiast, Cycle Operator
Time at which the survey was conducted	Morning	Morning
Weather		



# Our Findings from Handlebar Survey...(1/8)

## Segment A to B: 132ft Ring Road

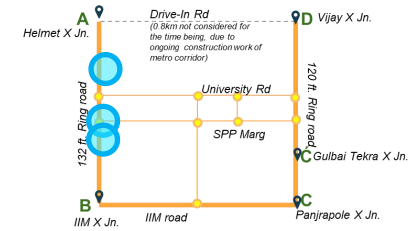


## Characteristics of the stretch

- 2.8 km (1.4 km on each side) cycle lane along the BRTS corridor
- Cycle lane of 2.25mt width
- 132ft ring road observes high speed mixed traffic and lot of wrong side traffic
- It also has dedicated lane for BRTS
- The stretch also has footpath, which is also not well maintained

# Photos of the pain points ...(2/8)

## Segment A to B: 132ft Ring Road



This is a dealbreaker because....



- *2W user enters cycle lane. Raises safety concerns for the cyclist*



- *Broken separator of cycle lane reflects lack of maintenance.*

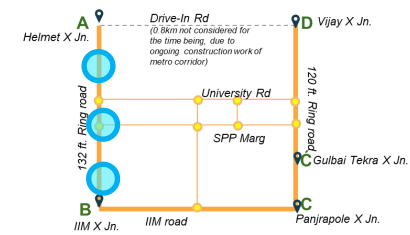


This is a dealbreaker because....

- *Raised manholes, broken surfaces- raises safety concerns and rider inconvenience*
- *Dirt filled track & weeds reflects the tracks are not cleaned unlike the mixed carriage way*

# Photos of the pain points ...(3/8)

## Segment A to B: 132ft Ring Road



- *Cycle track broken and illegally filled up, to provide access to property*



This is a dealbreaker because....

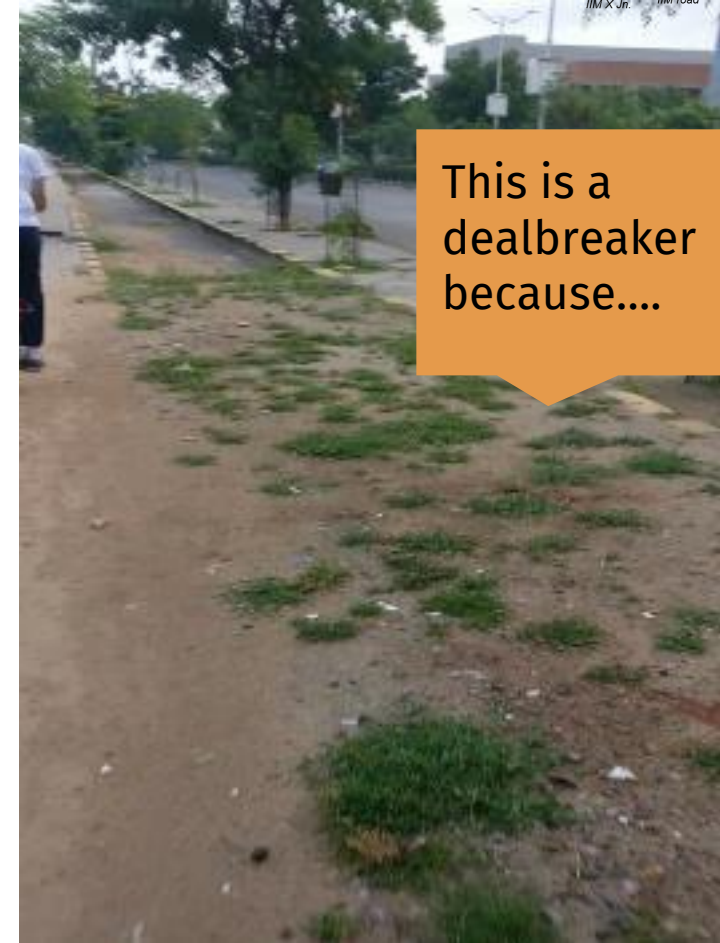
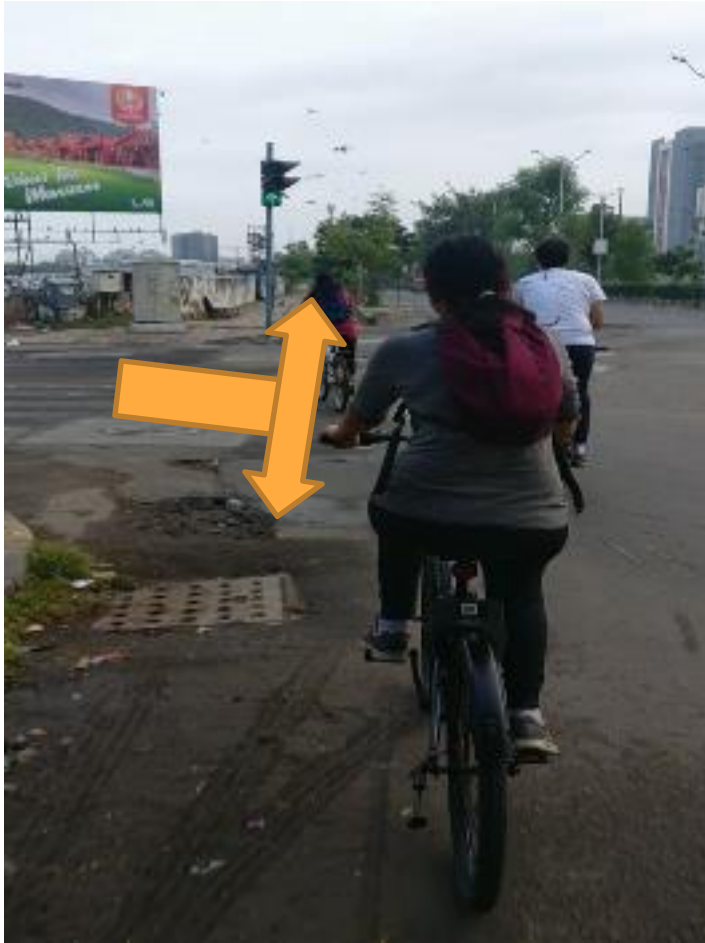
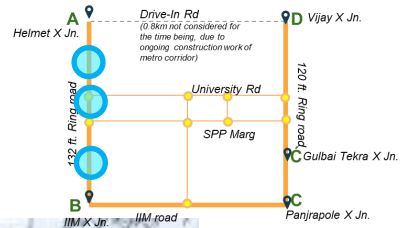
- *Cycle track broken and illegally filled up to provide access to property*



- *Uneven ramp of footpath next to property access, No signage, broken separator*
- *Slope toward the edge results in water accumulation in the cycle lane*

# Photos of the pain points ...(4/8)

## Segment A to B: 132ft Ring Road



This is a dealbreaker because....

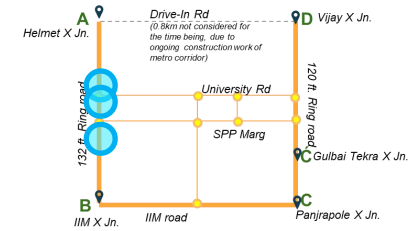
- *T- Junctions need proper design, signage, visibility to ensure safety for all*

- *Uneven surface and sudden elevation- compromises the seamless journey experience- forces cyclist to use footpath instead*

- *Sudden deposition of soil on cycle lane reflects the lanes are not maintained/cleaned/used*

# Photos of the pain points ...(5/8)

## Segment A to B: 132ft Ring Road



- Obstacle on lane by untrimmed/overgrown trees
- Track filled with soil



- Obstacle on footpath by untrimmed/overgrown tree.
- Nicely shaded though

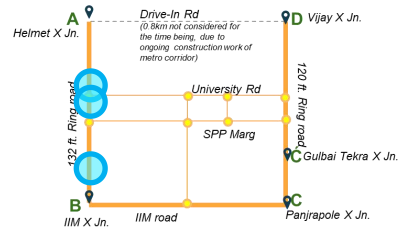


This is a dealbreaker because....

- Cycle lane filled with soil, weed, and untrimmed plants in and around making the track less usable

# Photos of the pain points ...(6/8)

## Segment A to B: 132ft Ring Road



- *Uneven surface causes rider inconvenience. Incase of low light it can also raise safety concerns*



- *Lack of restriction for entry of motorized vehicle can result in encroachment*

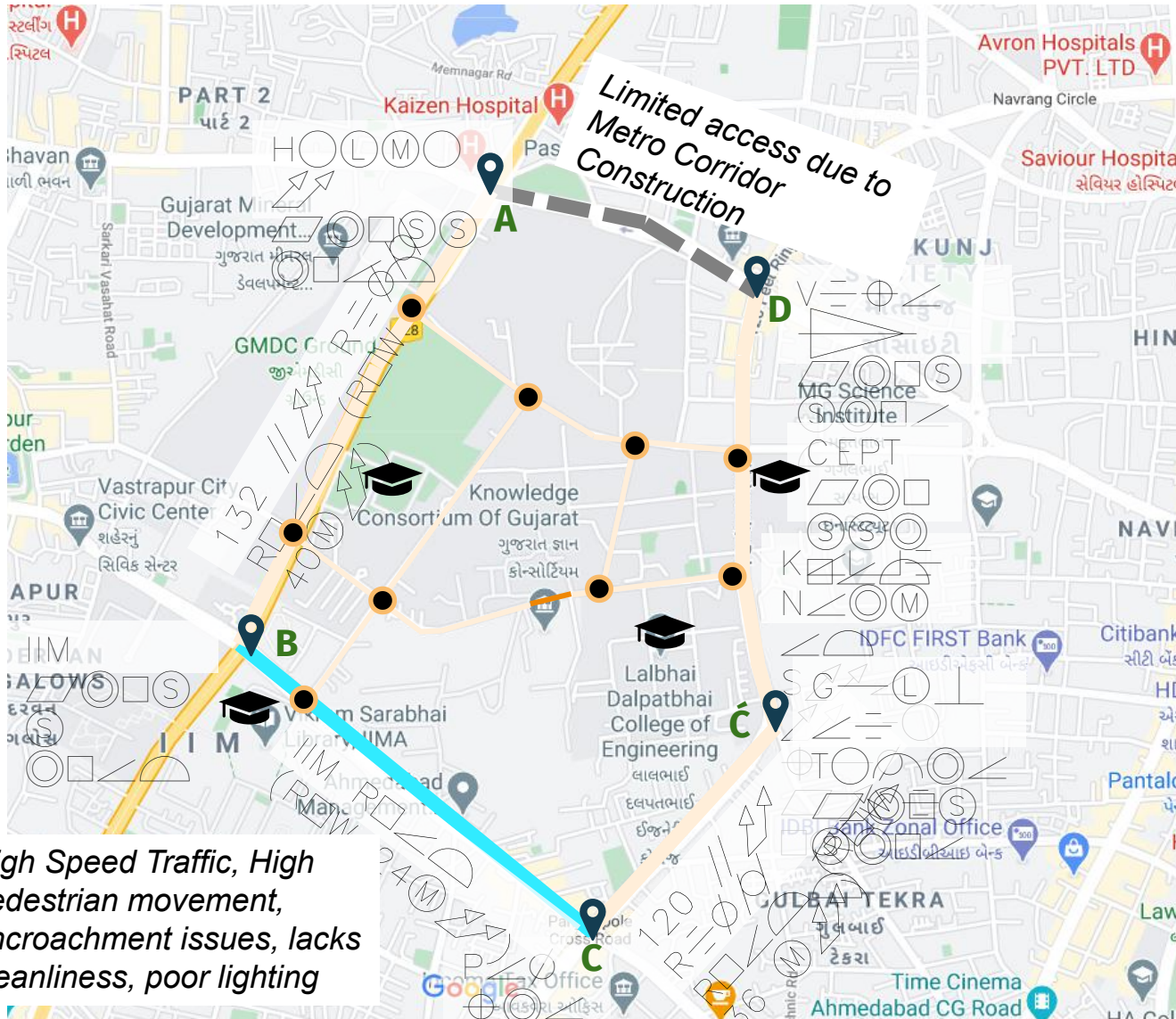


This is a dealbreaker because....

- *Sudden broken lane*
- *Protruding Manholes*
- *Encroachment by bike unsafely obstructing cycle lane*
- *Footpath, cycle tracks, service lanes lacks cleaning & maintenance*

# Our Findings from Handlebar Survey...(7/8)

## Segment B-C: IIM Road

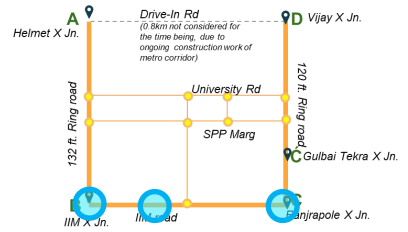


## Characteristics of the stretch

- Connects student population and others to the commercial stretch of Panjrapole, which is vibrant with food joints, shops, institutions and commercial spaces
- Ahmedabad Management Association located along the stretch host numerous trainings and programs, thereby attract crowd daily
- Hawkers & vegetable vendor are sited on the stretch
- Heavy movement of pedestrian observed

# Photos of the pain points ...(8/8)

## Segment B-C: IIM Road



- *Three lane road approx. 24mt road along with 2.5-3mt footpath, suitable for pop-up lanes*



- *From 3 lane road to 2 lane road as it approached to IIM junction. The flyover above carries high speed thoroughfare traffic*



- ***Slope towards the edge of the ROW causes water accumulation making it unsuitable for the pedestrians and cyclist.***



# Our Proposed Interventions for Pilot

## Segment A to B: 132ft Ring Road

The stretch has existing cycle track with sufficient width. But it is currently not maintained, encroached and unused. The recommendation for the stretch would be to refurbish the existing infrastructures and make it appealing and useful. Some immediate actions thought through by the committee members are;

Cleaning the tract from dirt, sand/soil depositions, garbage etc.

Repairing potholes, manholes and drainage and levelling them with surface

Pruning of plants, weeding

Removal of ad hoc constructions etc.

Repair the broken separator

Install bollards to restrict 2W entry

Increase signage

Smooth integration of cycle lane with junction

Improving the look & feel of PBS station

Allocate personnel for track cleaning and maintenance

**Thank You**