RaSpect

Internet Professional Association
互聯網專業協會

在大灣區推廣香港的科創業務

Predictive AI for the safety of built infrastructure

RICS
Tech Partner

Forbes Asia
100
TO WATCH

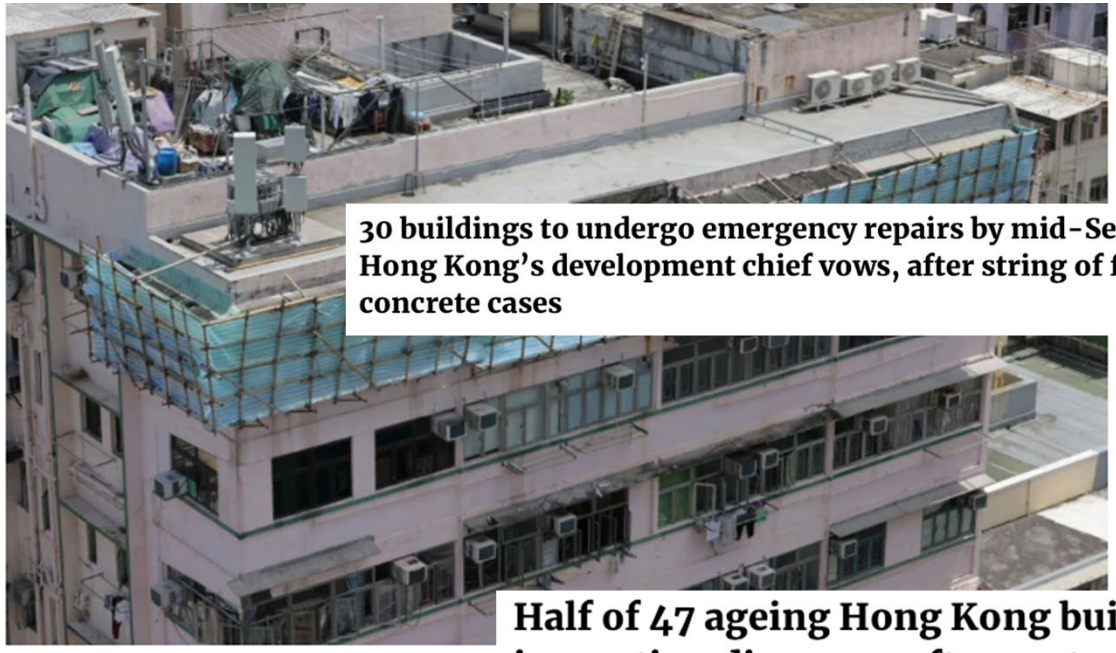
20 Technology Fast 20
2019 Hongkong
Deloitte.

KPMG China Leading
PropTech 50(2022)

Over half of 7,000 old Hong Kong buildings with inspection notices have yet to be reviewed, official says after second case of falling debris

- Director of Buildings Clarice Yu reveals 4,000 old structures have not carried out compulsory inspections
- Figures released after concrete and plaster chunks fell off residential building, raising safety concerns

Hong Kong has recorded at least 18 incidents of concrete and debris falling from buildings since July, with some cases leading to pedestrians being injured or damaging vehicles.



30 buildings to undergo emergency repairs by mid-September, Hong Kong's development chief vows, after string of falling concrete cases

Temporary protective measures, including scaffolding and nets, have been in

Half of 47 ageing Hong Kong buildings at 'immediate risk', inspection discovers after spate of cases involving falling concrete

Win-Win Partnership: Elevating Building Inspection

Shared Vision: Setting new industry benchmarks, optimizing processes, and fostering a more sustainable tomorrow.

Environmental Stewardship: Reducing the ecological footprint of building management activities through advanced, responsible practices.

Industry Transformation: Uniting industry expertise with cutting-edge technology for a revolutionary approach to building management operation.

Our Commitment: Together, we innovate, elevate, and create a positive legacy and synergy for building management.

Objective

We are dedicated to establishing a strategic alliance with industry , capitalizing on our pioneering **AI Big Data and robotics technology** to drive innovation in built infrastructure inspection.

Through seamless digitalization integration, our goal is to augment industry's scope of work and **empower itself with distinct competitive edge**.

Vision Mission Value

Vision:

We develop robust technology to support the **safety, serviceability and sustainability** (3S) of smart city.

Mission:

We develop AI, Big Data & robotics to build the AI safety analytics platform for built infrastructure at a cost-effective approach.

Value:

Fun. Innovation. Trust.
(FIT)

Invested by :

MINDWORKS
Alibaba Entrepreneurs Fund
HKSTP 香港科技園
Innovation and Technology Commission
The Government of the Hong Kong Special Administrative Region
Abacus Ventures
ParticleX

The Problem with Manual Inspection
&
RaSpect AI Inspection Solution

Customer Demands

Misses Critical Defects

“ Human inspectors may inadvertently overlook subtle or hard to detect defects in building facades, posing potential safety hazards leading to significant repair costs. ”

Property Owner

Long-term Quality Assurance

“ We would like to inform (buyer) owners that we offer long-term quality assurance service, but the traditional approach can’t meet my demand. ”

Real Estate Developer

Inefficient Building Lifecycle Management

“ Inaccurate or incomplete inspection data can lead to suboptimal maintenance planning and management, missing opportunities for preventive measures and ultimately resulting in increased maintenance expense for property owners. ”

Facility Manager

Limited Accessibility

“ Some buildings’ facades present difficult-to-reach areas, especially in high-rise or complex structures. The limitation of manual access may hinder the effectiveness of inspections and compromise the thoroughness of data. ”

Registered Engineer & Building Surveyor

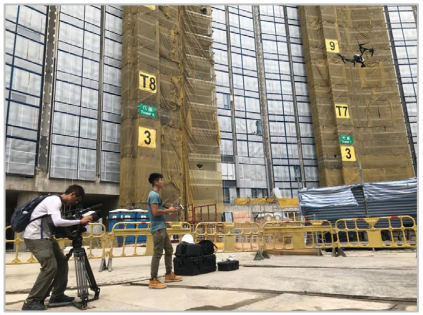
Time Consuming Inspections

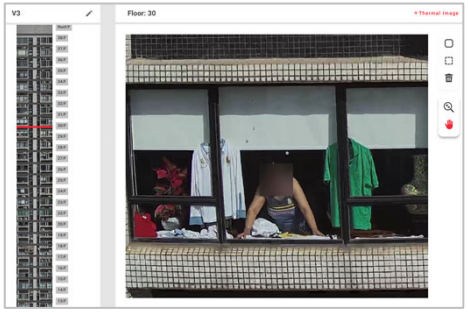
“ It’s difficult in meeting urgent scenarios. Because Limited scalability for handling multiple projects simultaneously and time-consuming which can take months to complete.”

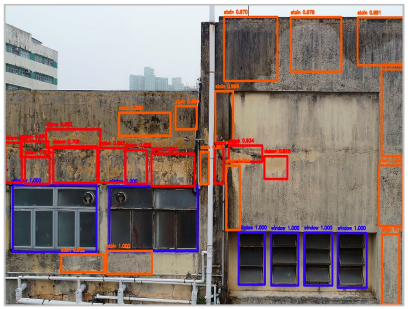
Government

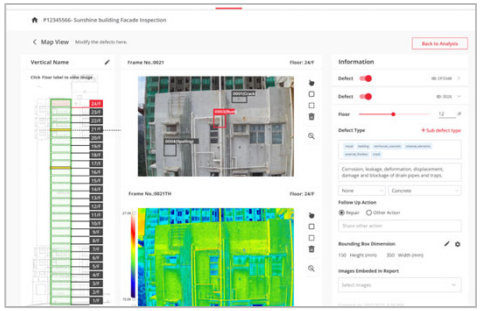
Solution: Improve Inspection Efficiency by 64%

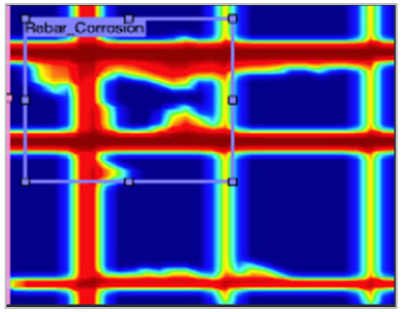
1. **Autonomous Data Capture**
2. **Data Upload, AI Data Positioning**
3. **AI Preliminary Analysis**
4. **Professional Endorsement & Reporting**
5. **Detailed Scan by Microwave Scanning Technology**











1 day vs. 3 days
RaSpect Traditional

+67%

2 days vs. 5 days
RaSpect Traditional

+60%

7 days vs. 20 days
RaSpect Traditional

+65%

*Schedule for a typical building of 20 storeys

Step 1 | Step 2 | Step 3 | Step 4 | Step 5

Autonomous Data Capture

Curtain Wall Building

▲ Close Up Inspection

▲ General Inspection

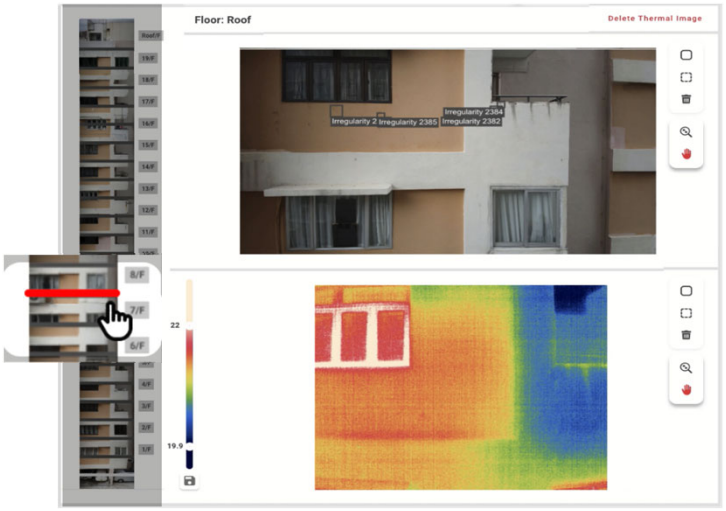
Reinforced Concrete Building

▲ General Inspection

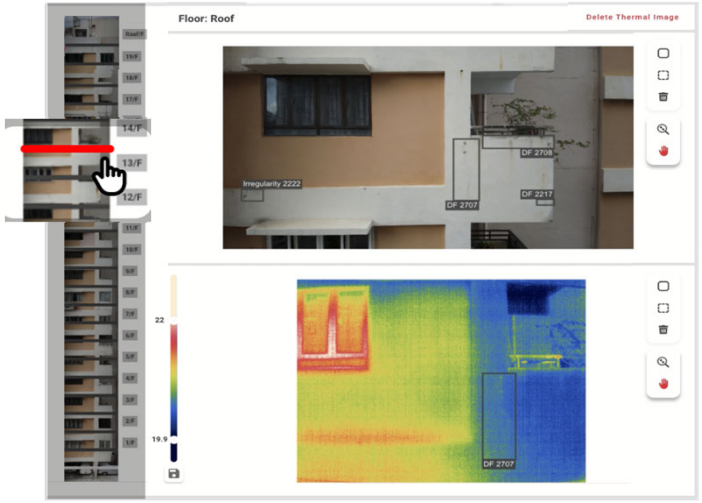
▲ Preliminary Inspection

Step 1 | **Step 2** | Step 3 | Step 4 | Step 5

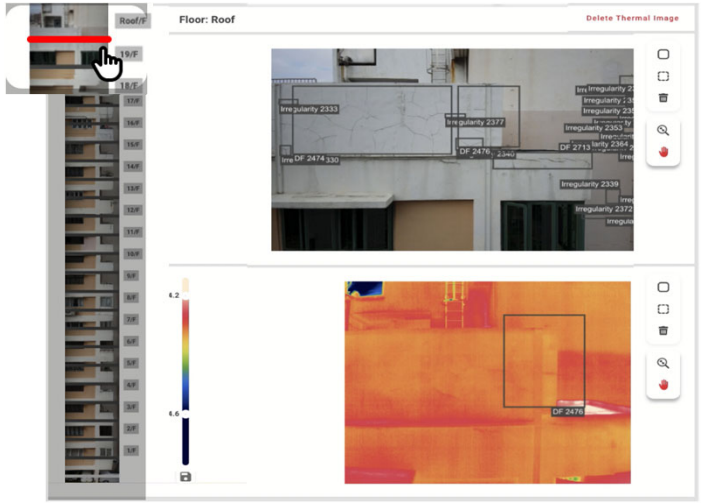
Data Upload & AI Data Localization



▲ Lower Floor



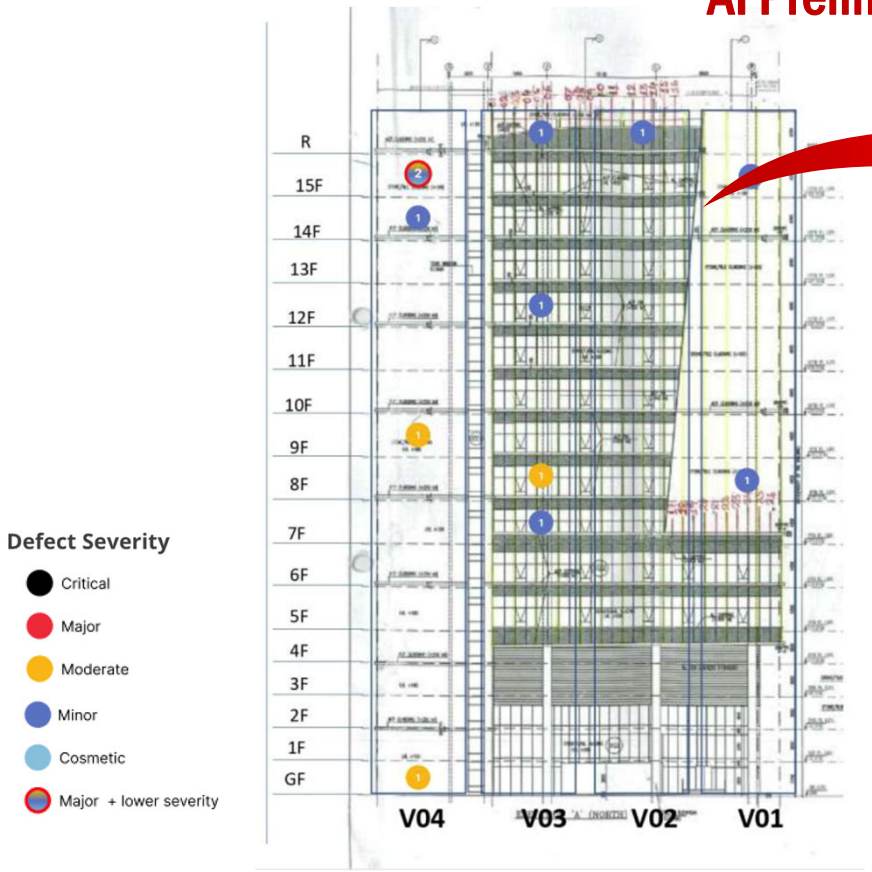
▲ Middle Floor



▲ Upper Floor

Step 1 | Step 2 | **Step 3** | Step 4 | Step 5

AI Preliminary Analysis



▲ Auto-suggested Defect Tagging

▲ AI Defect Analysis

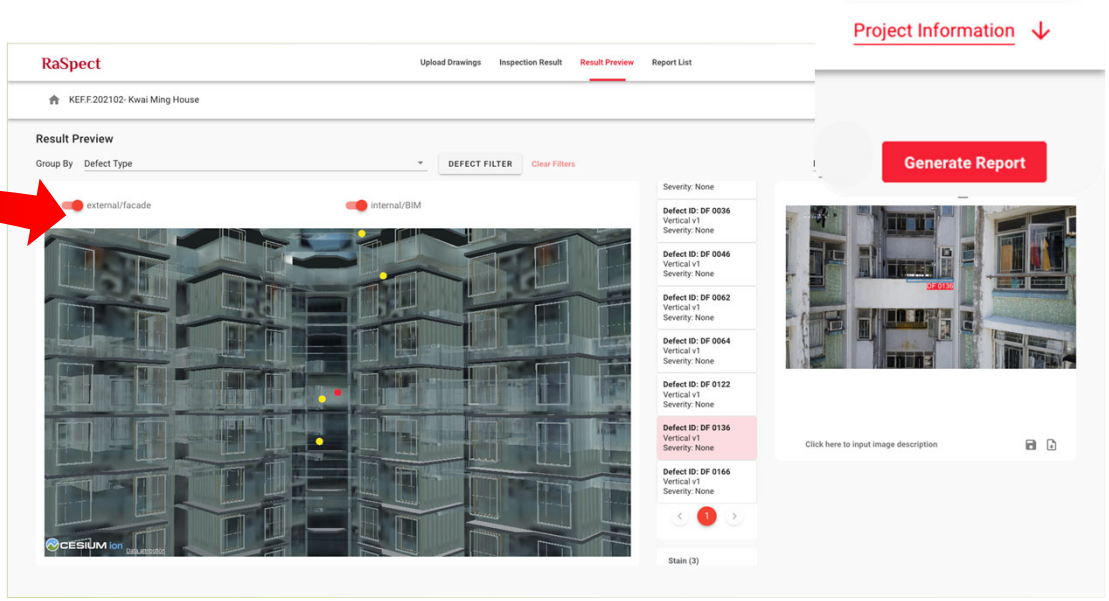
▲ Automatic Privacy Filter

Step 1 | Step 2 | Step 3 | **Step 4** | Step 5

Professional Endorsement & Reporting

Severity Level	Action
Critical Defect	Take action immediately
Major Defect	Take action as soon as possible
Moderate Defect	Take action when possible
Minor Defect	Monitor regularly
Cosmetic Issue	Keep under watch

▲ Severity Level Assessment Guidelines



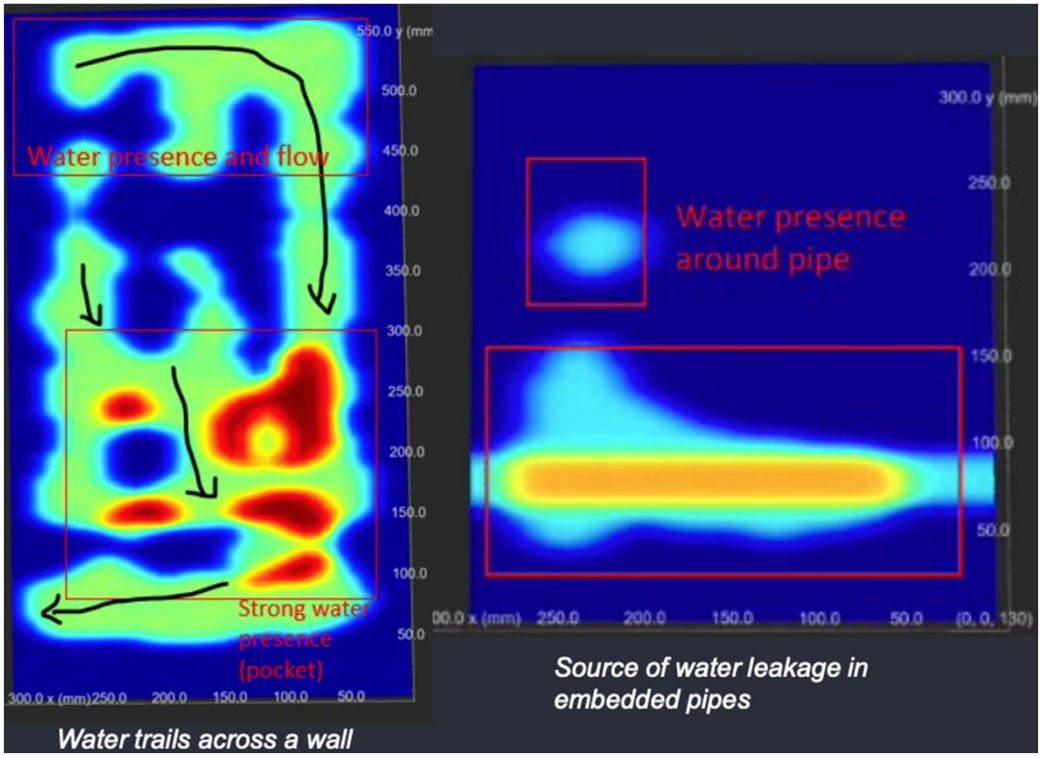
▲ Result Preview (3D/2D)

WaveScan

Step 1 | Step 2 | Step 3 | Step 4 | **Step 5**

Detailed Scan by Microwave Scanning Technology

▲ Data Collection for selected areas that require detailed inspection



▲ Use Case: Detection of Water Seepage in Concrete

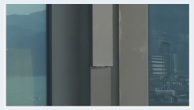
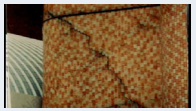
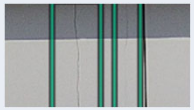
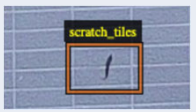
Severity Level Assessment Guidelines - Building Performance

Severity Level	Description	Action
Critical Defect	Represents immediate danger of falling objects. The owner has to be notified immediately to cordon off the area below to prevent any person from coming in. The owner has to engage a registered professional Surveyor/Inspector to carry out a thorough Inspection and to determine further appropriate repair works following MBIS guidelines.	Take action immediately
Major Defect	Affects safety of building user or public. Mainly concerns external elements with the risk of falling objects in some areas. May not immediately endanger the users or people nearby. Timely remedial action as per MBIS guidelines is highly recommended. Recommendation will be given in individual defect section.	Take action as soon as possible
Moderate Defect	Affects usage of the building element and may pose a medium risk to the occupants and/or members of the public. Regular monitoring is recommended (as per MBIS). Perform repair whenever possible. Remedial measures are recommended in individual defect section.	Take action when possible
Minor Defect	Defects that may affect safety and/or functionality in the future. Periodic monitoring(as per MBIS) is recommended since the defect may develop into a more severe class.	Monitor regularly
Cosmetic Issue	Issue that affects only appearance or Aesthetics of the building without posing any safety or functionality risk. Corrective action is discretionary.	Keep under watch

Sample Defects

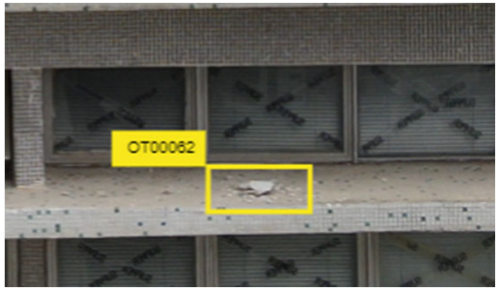
Concrete Related	Sample Image	Consequence/Impact	Metal /Grill Related	Sample Image	Consequence/Impact
Crack		Safety / Functionality / Cosmetic	Rust / Corrosion / Stained grill		Functionality / Cosmetic
Spalling		Safety / Functionality / Cosmetic	Blistering / Wrinkling		Functionality / Cosmetic
Delamination		Safety / Functionality / Cosmetic	Peeling		Functionality / Cosmetic
Reinf. corrosion		Safety / Functionality / Cosmetic	Stain		Cosmetic
Dent		Safety / Functionality / Cosmetic	Rust Stain		Cosmetic
Efflorescence		Functionality / Cosmetic			
Algal growth		Cosmetic			

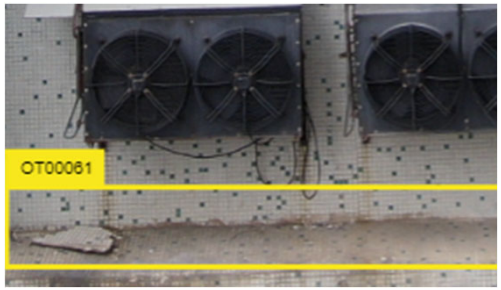
Sample Defects

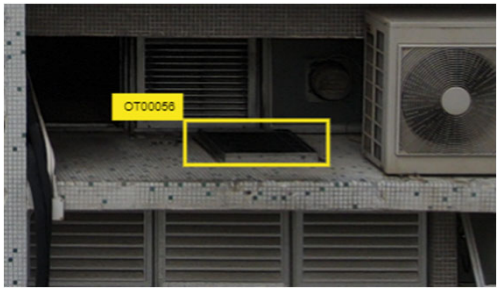
Tiles related	Sample Image	Consequence/Impact	Cladding Related	Sample Image	Consequence/Impact
Chipped tiles		Safety / Functionality / Cosmetic	Abnormal cladding		Cosmetic
Stained tiles		Safety / Functionality / Cosmetic	Misaligned cladding		Safety / Functionality / Cosmetic
Cracked tile		Safety / Functionality / Cosmetic	Cracked cladding		Safety / Functionality / Cosmetic
Missing tiles		Safety / Functionality / Cosmetic	Sealant/Grout Related		Safety / Functionality / Cosmetic
Misaligned tiles		Safety / Functionality / Cosmetic	Missing sealant		Safety / Functionality / Cosmetic
Buckled tiles		Functionality / Cosmetic	Deteriorated sealant		Safety / Functionality / Cosmetic
Scratched tile		Cosmetic	Abnormal sealant		Safety / Functionality / Cosmetic

Severity - Critical Defects

Spalling, Delamination, Loose objects, Falling object Risk







Cause	Description	Consequence/Impact
The critical defects on building façade occur due to long neglected repair and maintenance that leads to objects such as spalled concrete, broken tiles, delaminated claddings or corroded metal components etc. becoming loose presenting an imminent danger of falling objects.	The critical defects are the ones that are caused by any object such as a loose piece of concrete, broken piece of tile or any components attached to the building façade which may be in imminent danger of falling off causing risk of injury to occupants or members of public.	• Can cause severe injury or even death to persons by falling objects from building façade. • Represents a building in poor condition or disrepair • Should be attended to immediately

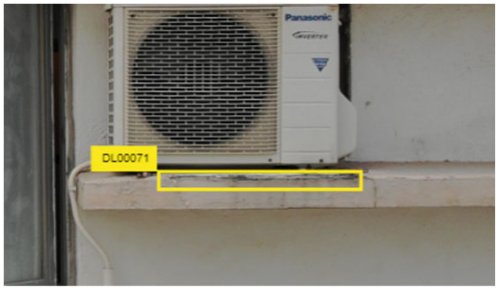
Severity - Major Defects

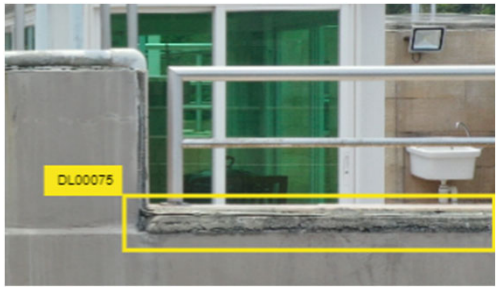
Cracks, Spalling, Delamination, Corrosion, Falling object Risk

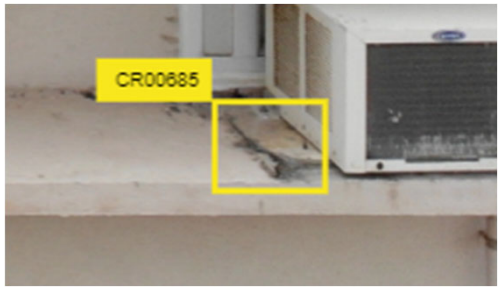
Cause	Description	Consequence/Impact
The major defects on building façade occur due to long neglected repair and maintenance that leads defects such as cracks, spalling, delamination of large size representing danger to the safety of the building and sometime falling object risks. These defects may also develop due to overloading, ad hoc alterations, UBW, foundation movement etc.	The major defects are the ones represent safety risk to the building and in some cases falling object risk although not immediately. Large cracks, spalling, delamination, corrosion of steel, missing tiles, cracked glass or claddings would fall in this category. Typical dimension would be 0.1 sq m area affected per defect or crack width of 1 mm or above.	• Can result in collapse of part or all of the building. • Could lead to falling object incidents if unchecked. • Can be expensive to repair

Severity - Moderate Defects

Cracks, Spalling, Damp, Missing Tiles, Chipped Tiles, Rust



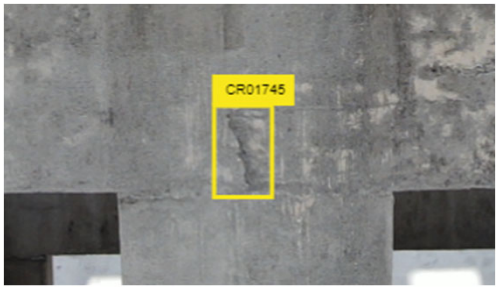


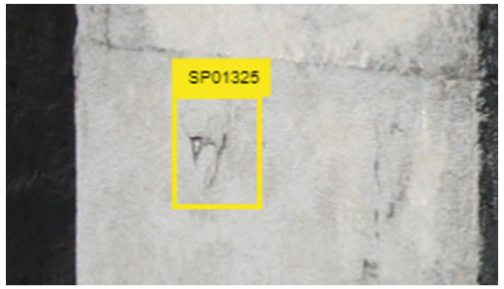


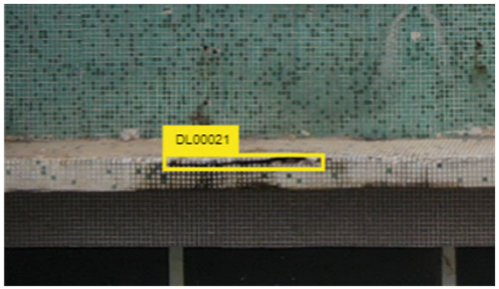
Cause	Description	Consequence/Impact
The moderate defects on building façade occur due to neglected repair and maintenance that leads defects such as cracks, spalling, delamination, dampness of large that may affect the functionality of the building. These defects may also develop due to overloading, ad hoc addition and alterations (A&A), UBW, foundation movement etc.	These defects affect usage of the asset and may pose a medium risk to the members of the public. Regular monitoring is recommended. Perform repair whenever possible. Remedial measures are recommended in individual defect section.	• Can affect functionality and durability of the building. • Could lead to higher category of severity if unrepaired. • Can be difficult to repair – especially moisture issues

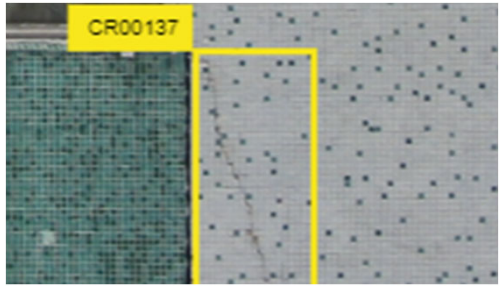
Severity - Minor Defects

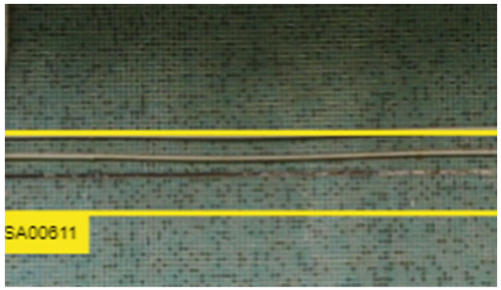
Cracks, Spalling, Damp, Missing Tiles, Chipped Tiles, Rust







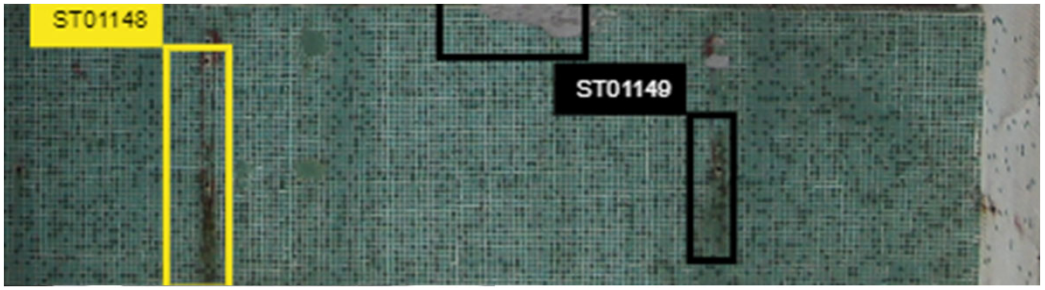


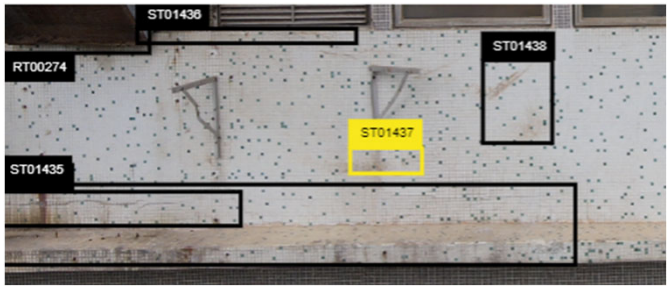


Cause	Description	Consequence/Impact
The minor defects on building façade occur due to neglected repair and maintenance or defective workmanship that leads defects such as cracks, spalling, delamination, dampness of relatively small size that may affect the safety and functionality of the building in future left neglected.	Defects that may affect safety and/or functionality in the future. Periodic monitoring is recommended since the defect may develop into a more severe class.	• Unpleasant look for the building. • Can affect functionality and durability of the building in future. • Could lead to higher category of severity if unrepaired. • Should be monitored

Severity - Cosmetic Defects

Stains, Rust, Efflorescence, Discolouration, Fading, Mismatched





Cause	Description	Consequence/Impact
The cosmetic issues on building façade occur due to maintenance and natural wear and tear due to the exposure to the weathering elements. It leads to stains, discoloration, fading etc. of the building façade.	Issue that affects only appearance or aesthetics without posing any safety or functionality risks. Corrective action is discretionary.	• Affect look of the building • Can decrease market value

Value Proposition

Smart

- AI-based Defect Detection & Analysis
- High Accuracy of Data Localization
- 3D Navigation with BIM and GIS Integration
- AI Defect Dimensioning

Efficient

- 64% More Efficient Workflow & Team-Work Using Cloud Platform
- 100% Digitized Building Data and Inspection Report on Cloud
- AI Face Blurring and Privacy Filter
- Automated Report Generation

Cost Effective

- 67% Faster Data Capture
- 65% Faster Report Generation
- Worker Risk Free
- 50% off Project Cost

KEY ACTIVITIES

Key Activities

- **Part 1. Onsite Inspection (Service Operator)**
  - 1A. Drone based – Aerial Data Collection
  - 1B. Mobile App based – Handy Data Collection
  - 1C. Microwave based – Holographic Imaging Data Collection
  - 1D. Robot based - Lightwell Data Collection
  - 1E. Vehicle based – City level Data Collection

- **Part 2. AI Preliminary Analysis (RaSpect)**
  - 2A. Data Localization of all Captured Visual and Thermal Photos
  - 2B. Inspectica™ Platform for Data Post-processing and Data Visualization
  - 2C. Irregularities Finding Summary

- **Part 3. Professional Endorsement & Reporting (Surveyors / Engineers)**
  - Verified by Chartered Surveyors / Engineers

1. On-site Inspection

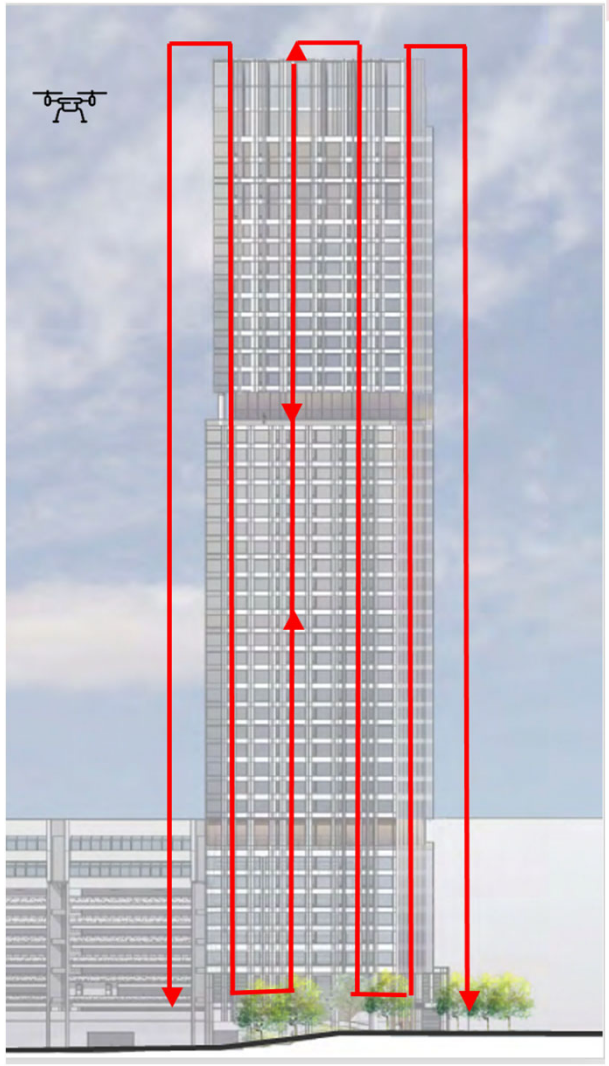
On-Site Flight Prep, Setup and Final Checks

I. Arrival on site at designated time (crew of one Pilot-in Command, and one Observer/Spotter)
II. Set up and cordoning of landing / take-off zone
III. On-site assessment to note any changes / hazards / issues that may have arisen since pre-site survey
IV. Setup and preparation of drone and ancillary equipment (batteries, etc.) for required flight(s)
V. Final weather / frequency spectrum / GPS / and other avionics checks prior to flight

Legend: Red envelope – Sample Flight Path

- Pre-set the flight path in a grid pattern for autonomous Unmanned Aerial Vehicle inspection
- Unmanned Aerial Vehicle shall photograph by scanning vertically and/or horizontally for optimal coverage
- Unmanned Aerial Vehicle captures images via 4 different directions (E>S>W>N)
- All images would be geo-tagged with GPS information.
- Co-Pilot records the operation details in a time-log for reference check, to reassure the location of the captured data.
- Unmanned Aerial Vehicle will fly closer to building for defects closeup.

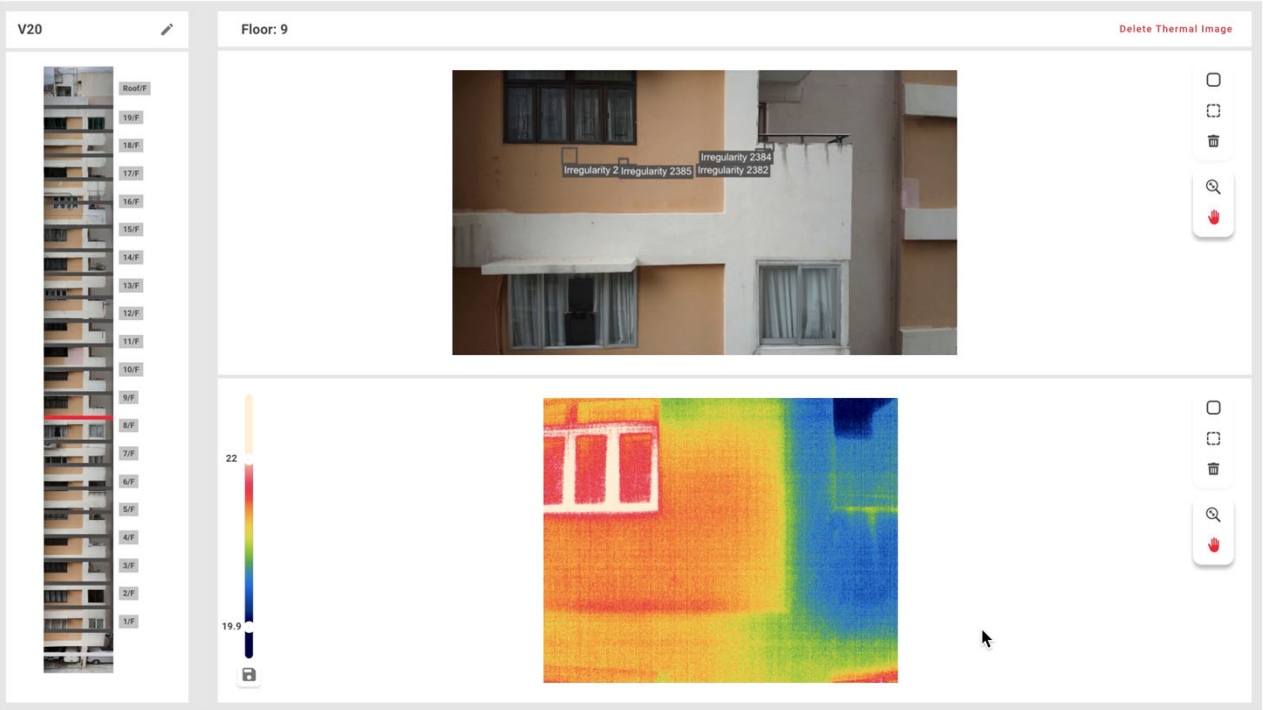
Limitation: Constrained facade regions, like light well and inner corners of the buildings, may not be favorable for aerial data capturing. The operation team will try to capture data at an angle to compensate as much as possible.



▲ *(Ref. Case)Sample illustration of drone flight path*

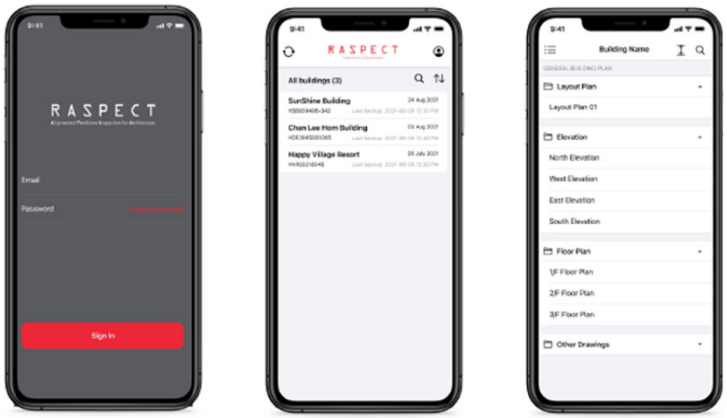
1A. Drone based – Aerial Data Collection (Visual & Thermal)

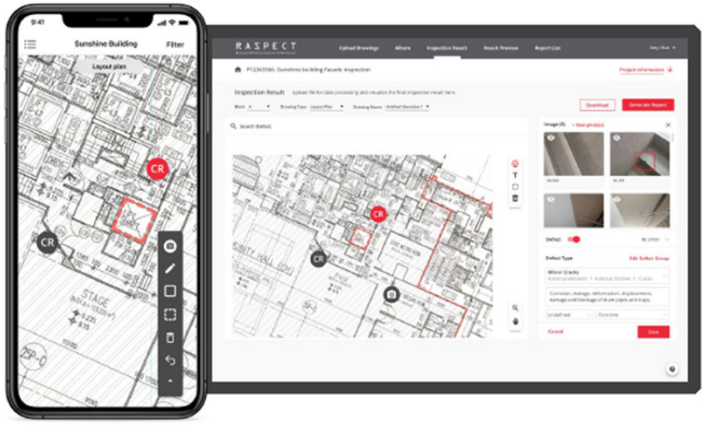
Systematic high definition visual and thermal survey of designated roof, cladding, curtain wall and high ceiling area supplemented with high resolution still photos for identified problem areas. Includes careful flight path documentation of all areas scanned for clear identification when post processing.



▲ *(Ref. Case) Data collection, localisation and defects finding by using AI-Powered Analysis Algorithm*

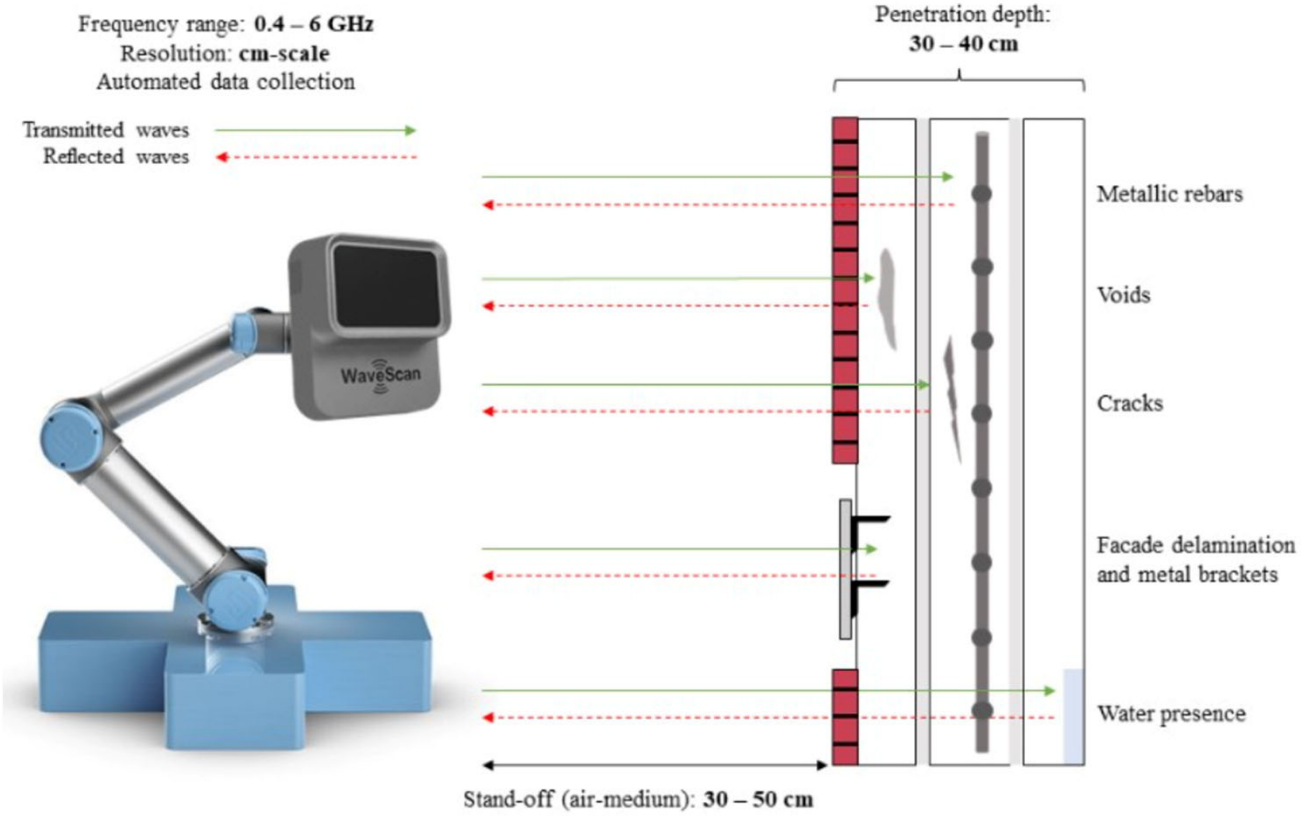
1B. Mobile App based – Handy Data Collection (Visual only)



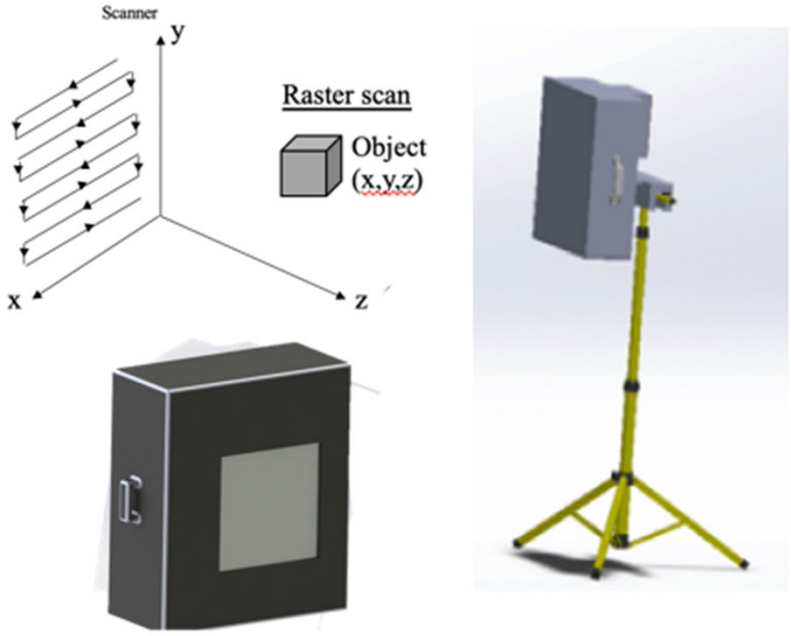


1C. Microwave based – Holographic Imaging Data Collection

A first of its kind non-contact see-through imaging technology that compliments visual inspections for identifying embedded defects or hidden source of water seepage inside cladding.



1C. Microwave based – Background of Microwave Scanning Technology



▲ Raster motion of the Large Area Scanner

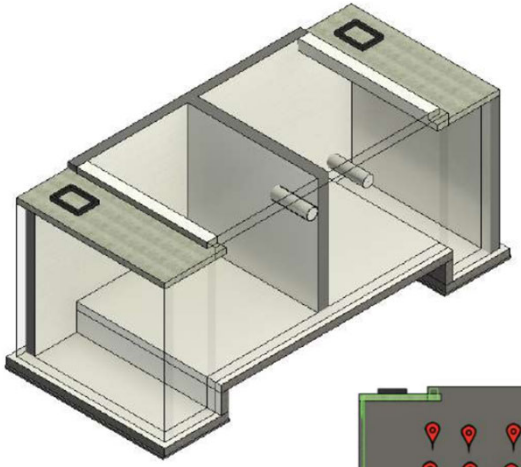
MHI Technology

- The Microwave Holographic Imaging (MHI) works based on backscattered electromagnetic waves (0.4 – 6 Hz).
- The wideband data is collected over an aperture by deploying the scanner on a robotic platform.

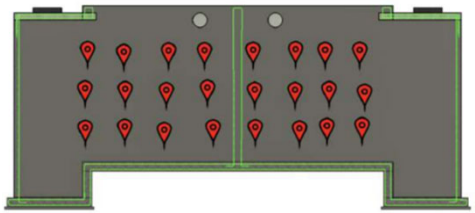
Image Synthesis and Enhancement

- The wideband data collected is used to synthesise a virtual large aperture leading to sharp and focused images.
- Advanced post processing techniques are used to further enhance data fidelity.
- Can accurately detect metallic objects, honeycombing (voids) embedded in non-metallic media such as concrete, stone claddings, etc.
- Used to get accurate images with an image resolution up to 1cm in multi-layered media.

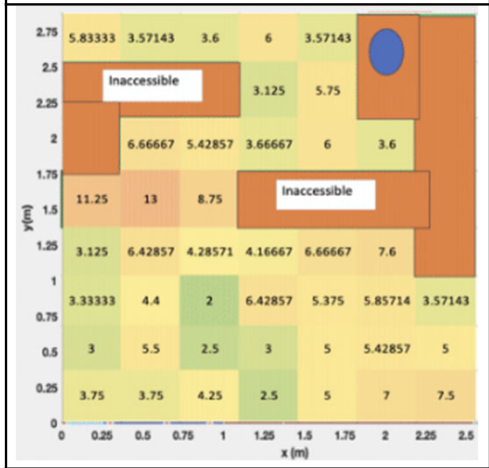
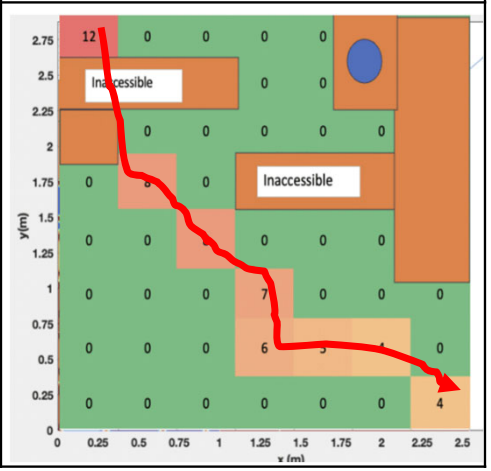
1C. Microwave based – Water Leakage Use Case



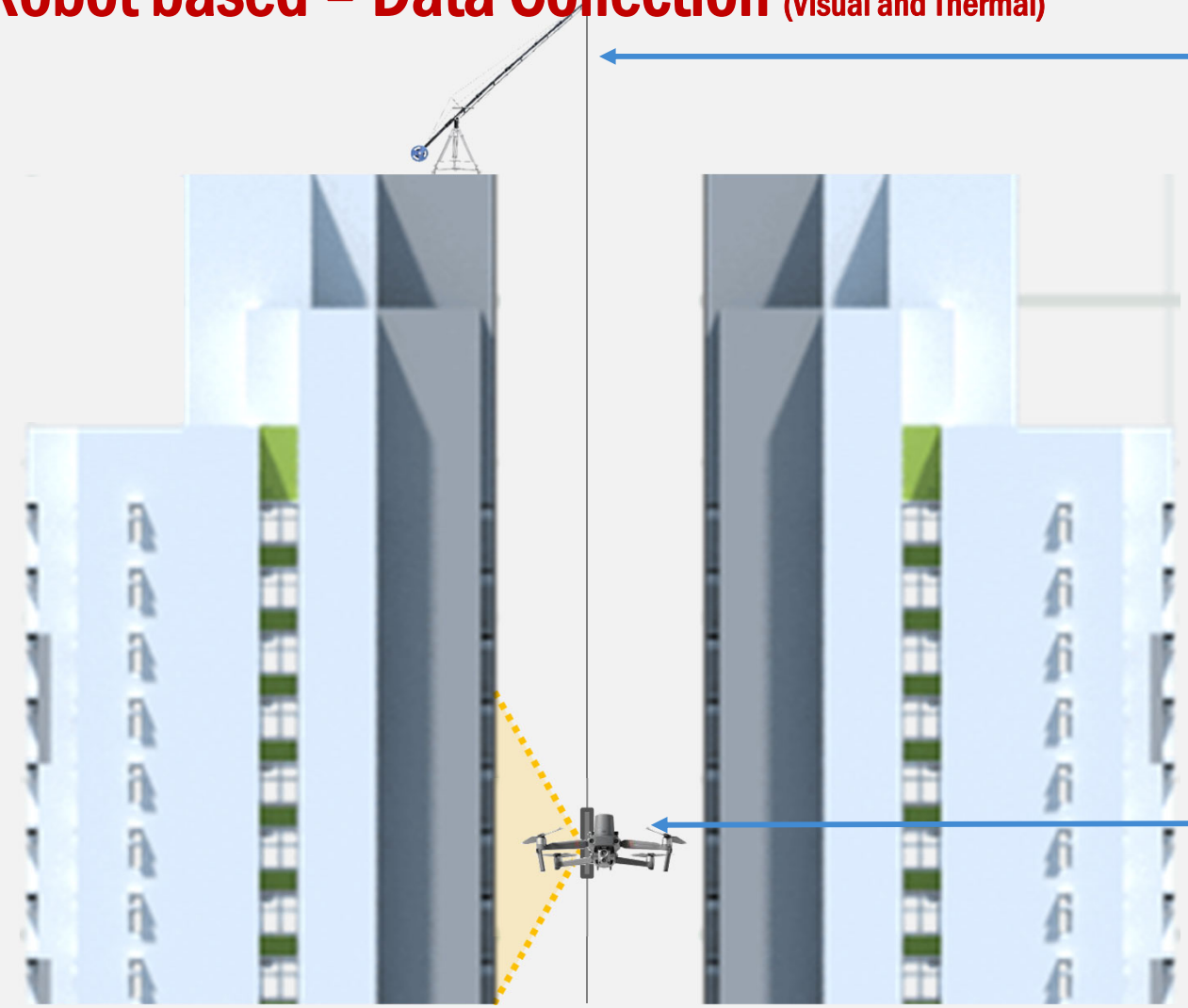
▲ 3D Model of Asset



▲ Mapping Points of Scan Location

% Concrete Damage	Depth of Water Presence and Pattern of Water Flow
(Volume of damage / Total volume) * 100%	
	

1D. Robot based – Data Collection (Visual and Thermal)



Hardware Technology

Guiding System

- Cable jib system
- Suspend wire-rope towards the ground
- Secured on the roof for additional safety

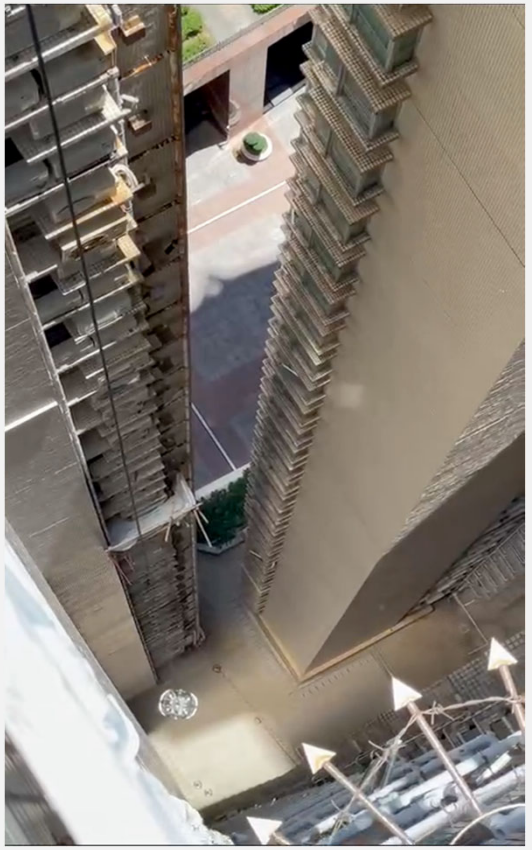
UAS (Drone)

- Equipped with infrared and visual camera
- Protected by propeller guard
- Can equip lighting for illumination

1D. Robot based – Camera Jib System

Generation 1

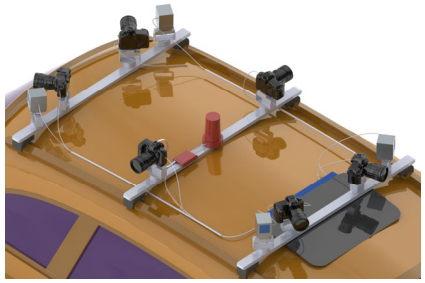
Generation 2



1E. Vehicle based – City level Data Collection (Visual and LiDAR)

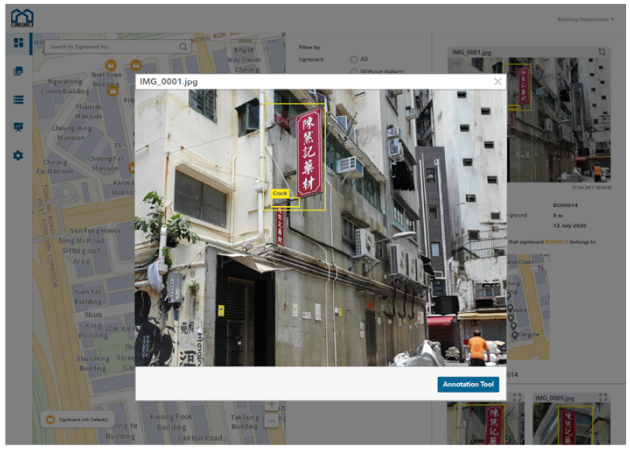
City Survey → Data livestream → AI Defective Detection

Visual and Lidar data capture
With GPS



5G data streaming to the cloud server for processing and visualisation

AI-powered defective detection displayed on cloud platform



Part 2. Inspection Deliverables

2A. Data Localization of All Video, Visual and Thermal Images

All video, image and thermal image assets are sorted into folders by facade area and floor level. All data referenced and recorded are provided as a PDF catalogue of reference documents.

2B. **Inspectica™** for Data Analysis and Visualization

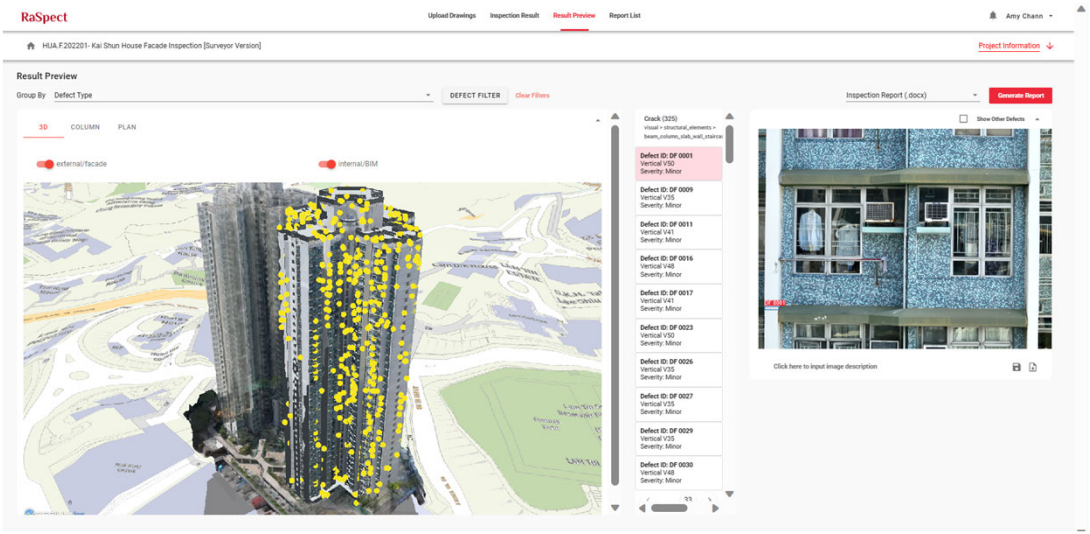
All video, image assets posted and uploaded to our custom-configured, **Inspectica™** cloud-based platform.

2C. Irregularities Finding Summary

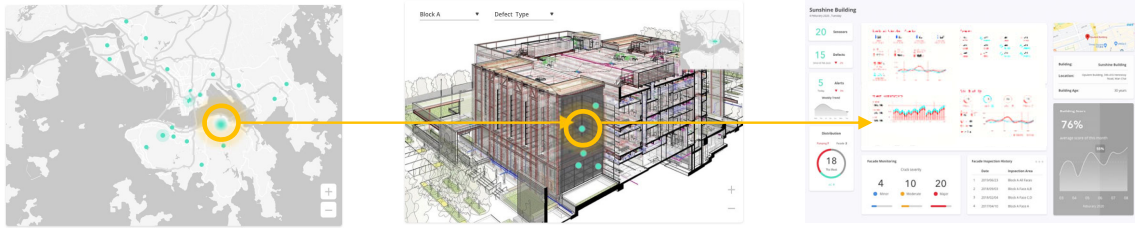
Inspectica™ as a platform for client to review all project details, including assorted raw data, comment from surveyor/engineer partner:

I. Image record of the data captured area

II. Identify and localize the irregularities to corresponding area on the elevation



▲ (Ref. Case) Sample dashboard of Inspectica™ platform

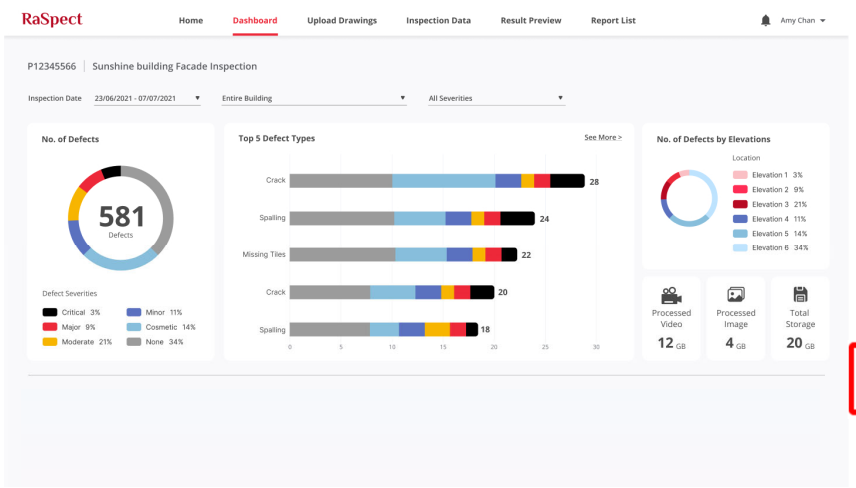


Regional | Building | Building Analytics

Part 3. Report Endorsement by Chartered Surveyors / Engineers

Chartered building engineer examine the result including the following:

I. Visual and thermal image record
II. Analysis and evaluation of the collected data
III. Comment on the overall building condition



Background

Address	Tsim Tsa Tsui, Hong Kong
Job Nature	Raspect
Project No.	P12345566
Operation Date	15 May 2023
Date of Issue	31 May 2023

Revision Log

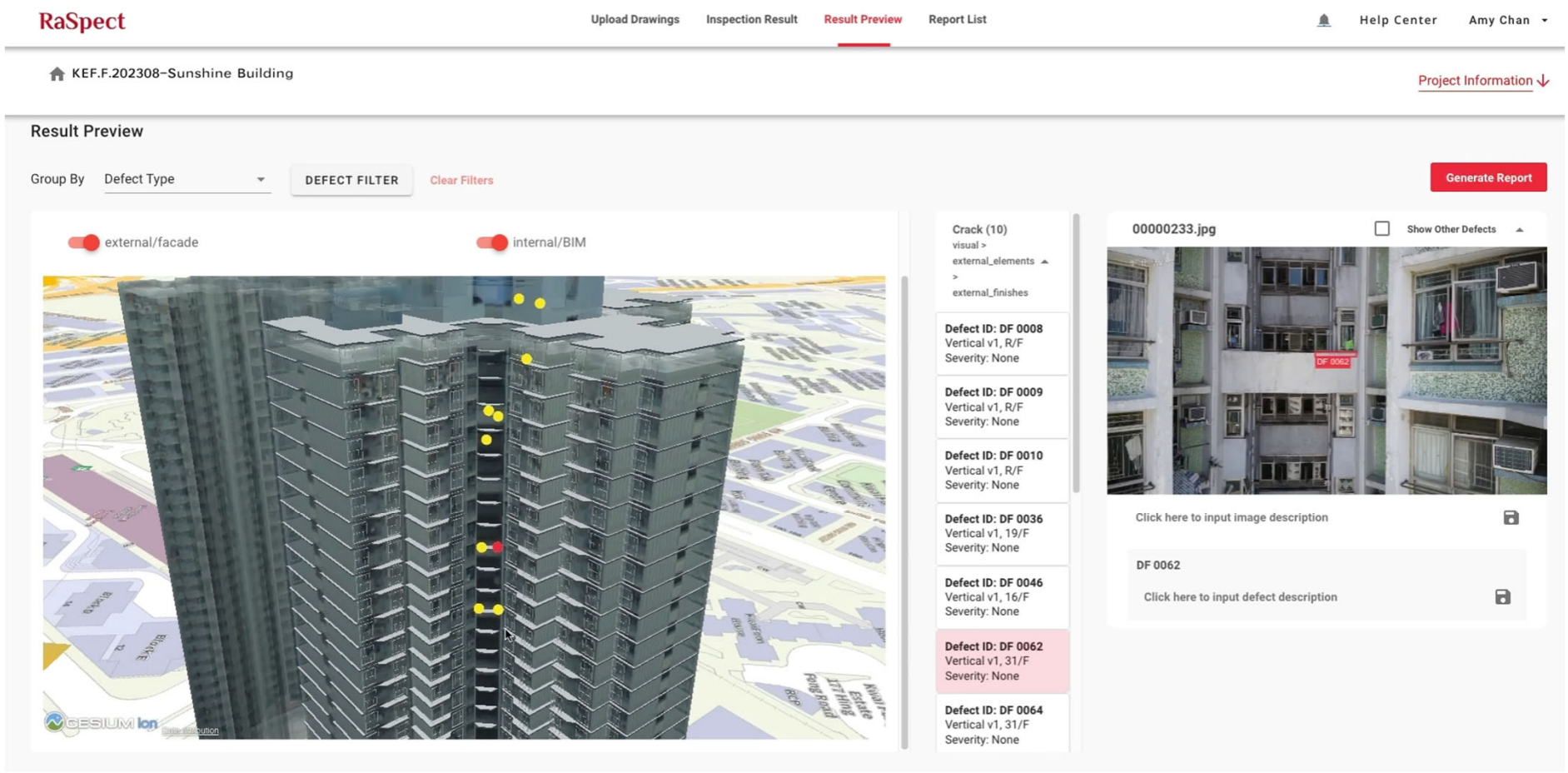
Revision	Version 1.0
Remarks	All defects are correctly identified and report is complete
Issue Date	10 May 2023

Endorsor Information

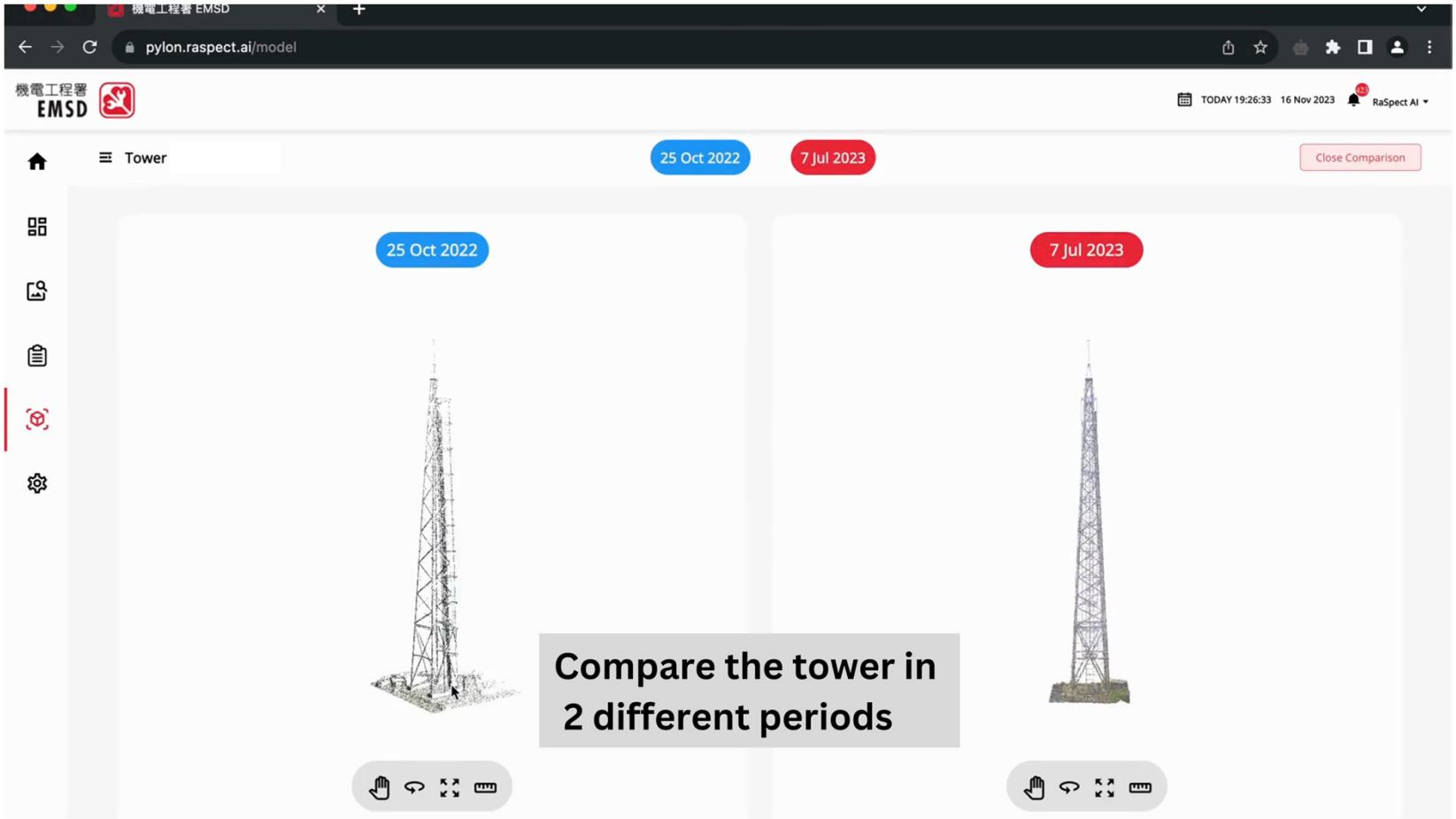
Endorsor Name	Mr. Ronan XYZ
Remarks	**Building condition is satisfactory**
Date of Expiry of Registration	10 May 2023
Review Date	10 May 2023
Endorsor Signature	Upload Signautre

References

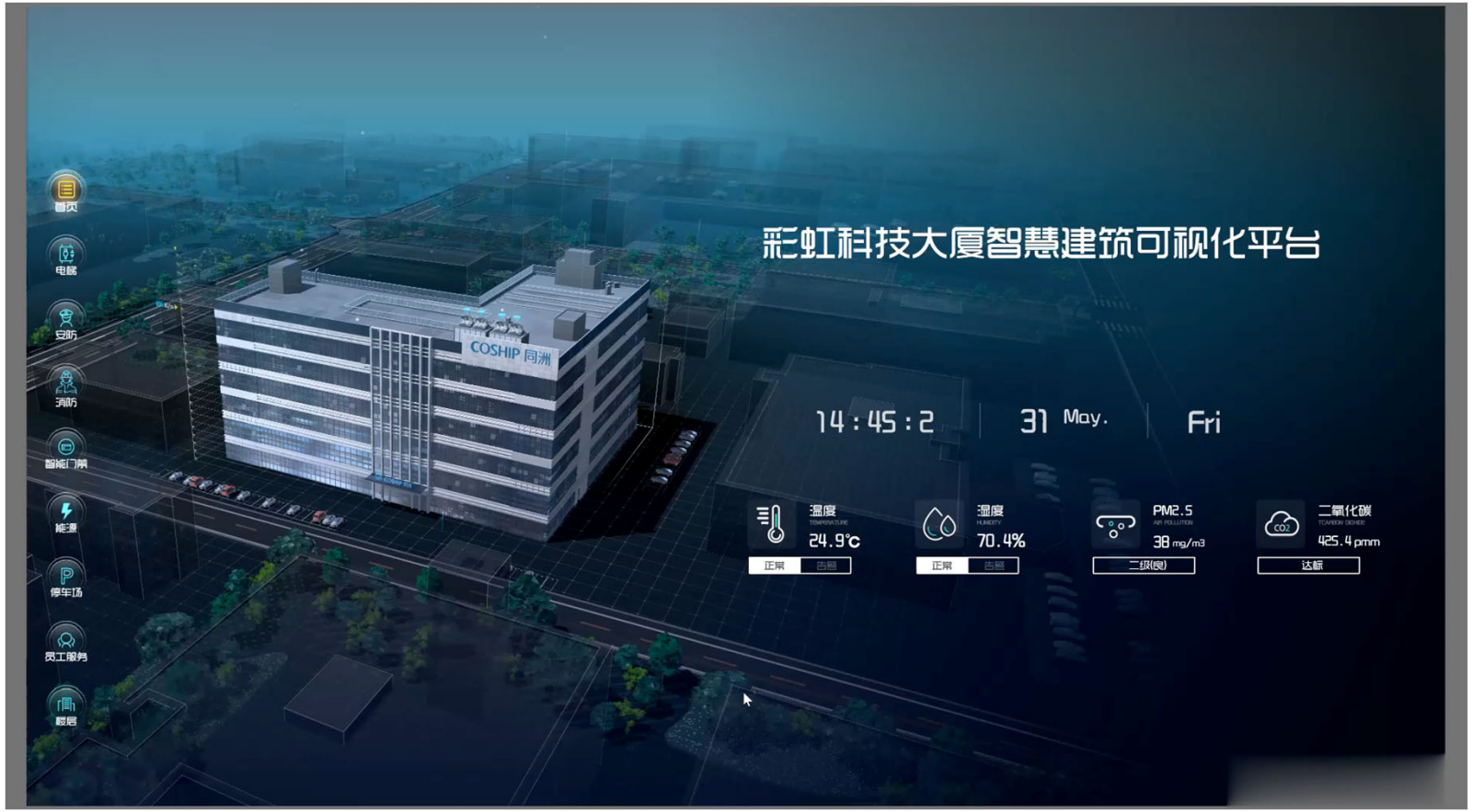
Inspectica™ Demo Video – Including 3D Model



RaSpect – Pylon Tower Inspection Project



RaSpect – AI Empowered Digital Twin Platform



100+ Customers

Property Owners & Real Estate Developers

SWIRE

MTR

鷹君集團有限公司
Great Eagle Holdings Limited

SINO GROUP 信和集團

KERRY PROPERTIES

HONG KONG DISNEYLAND

港燈 HK Electric

RaSpect

Facility Managers

Goodman

JLL

昇捷 SYNERGIS

Hactl

Knight Frank

CBRE

高衛物業管理有限公司 GOODWELL PROPERTY MANAGEMENT LTD
長江實業(集團)有限公司全資附屬機構
A wholly-owned subsidiary of CHEUNG KONG (HOLDINGS) LIMITED

CSX World Terminals HONG KONG

環球貿易廣場 INTERNATIONAL COMMERCE CENTRE

啟勝管理服務有限公司 KAI SHING MANAGEMENT SERVICES LIMITED

雅居物業管理有限公司 Modern Living Property Management Ltd

Consultants/Registered Engineers/Building Surveyors

金城 KUM SHING

保華建業 Paul Y. Engineering

ARUP

intertek Total Quality. Assured.

G&M Holdings Limited

中國建築國際集團有限公司 CHINA STATE CONSTRUCTION INTERNATIONAL HOLDINGS LIMITED
(於開曼群島註冊成立之有限公司)
(Incorporated in the Cayman Islands with limited liability)

香港工程質量檢測中心有限公司 Building Diagnostic Consultants Limited

AECOM

PRUDEN 普緹

協興建築 HIP HING CONSTRUCTION
新創建集團成員 Member of NWS Holdings

陳旭明測計師行

Governments

建築署 Architectural Services Department

HONG KONG HOUSING SOCIETY 香港房屋協會

機電工程署 EMSD

香港房屋委員會 Hong Kong Housing Authority

屋宇署 BUILDINGS DEPARTMENT

路政署 HIGHWAYS DEPARTMENT

Signature Works

200+
Buildings Inspected

10,000+
Flight Trips

3+ Million
Images

Reference Cases

Building Type	Building Name	Client Name	Year of Completion	Product Type
Government Projects				
Heritage	Old Pathological Institute	Architectural Services Department	2022	Façade
Heritage	Heritage Discovery Centre	Architectural Services Department	2022	Façade
Heritage	Cattle Depot	Architectural Services Department	2022	Façade
Heritage	Jao Jsung-I Academy	Architectural Services Department	2022	Façade
Heritage	Tai Fu Tai Mansion	Architectural Services Department	2022	Façade
Government	Former Sai Kung Central Primary School	Architectural Services Department	2020	Façade
Heritage	Sam Tung Uk Museum	Architectural Services Department	2019	Façade
Residential	Piping Inspection x 4 blocks (PoC)	Buildings Department	2021	Façade
Government / Consulting	Road Image Capturing System - HK Island – 2 Years Contract	Highways Department / Paul Y	On going	Others
Government / Consulting	Road Image Capturing System - New Territories – 2 Years Contract	Highways Department / Shun Yuen	On going	Others
Lift - Rope	EMSD Headquarter	EMSD	2020	Lift
Lift - Current	EMSD Headquarter	EMSD	2020	Lift
Government / Consulting	Ap Lei Chau Bridge	Highways Department / Paul Y	2022	Others
Residential	Kai Shun House	Housing Authority	2022	Facade
Residential	Lai Yiu Estate	Housing Authority / Modern Living	2022	Façade
Residential	Lee Hong House	Housing Authority	2023	Consulting
Residential	So Uk Estate	Housing Authority	2023	Consulting
Residential	Choi Hung Estate	Housing Authority	On going	Facade
Government	Hong Kong Space Museum (ASD Property)	A&D Surveyors Ltd	2021	Façade
Government	Hong Kong Cultural Centre (ASD Property)	A&D Surveyors Ltd	2021	Façade
Government	Heritage Discovery DSS	A&D Surveyors Ltd	2021	Drone
Government	Lotus Tower Block 4	Hong Kong Housing Society	2020	Façade
Government	Shun Lee Sports Centre (ASD Property)	A&D Surveyors Ltd	2020	Façade
Government	Shui Wo Municipal Building	A&D Surveyors Ltd	2023	Facade

Building Type	Building Name	Client Name	Year of Completion	Product Type
Building Inspection				
Commercial	International Commerce Centre (ICC) - Façade	Kai Shing Management Services Ltd	2022	Façade
Commercial	Cheung Kong Centre	G&M Curtain Wall Maintenance	2023	Façade
Commercial	BOC Tower	Modern Living / Great Wall Consultant Limited / United Consultant	2023	Façade
New Built	The Regent	China State Construction Engineering	2020	Façade
New Built	The Lohas Park	China State Construction Engineering	2020	Façade
Heritage	Parliament House	Craft / Azure sky development	2022	Façade
Commercial	Domain Mall	G&M Curtain Wall Maintenance	2022	Façade
Industrial	Goodman Tsuen Wan West Block 3	Goodman Logistics (HK) Limited	2023	Façade
Industrial	Goodman Tsuen Wan West Block 1	Goodman Logistics (HK) Limited	2023	Façade
Commercial	One Citygate Office Tower	Swire Properties Limited	2021	Façade
Commercial	Great Eagle Centre	Modern Living / Great Wall Consultant Limited / United Consultant	2023	Facade
Residential	Kwai Fong Estate x1	Modern Living / Great Wall Consultant Limited / United Consultant	2022	Façade
Commercial	MTR HQ Tower 1 & Hung Hom	MTR Corporation Ltd	2023	Facade
Residential	The Waterfront x 7 blocks	MTR Corporation	2021	Façade
Commercial	Megabox Office Tower	Kerry Property - Megabox Management Services Ltd	2019	Façade
Residential	Laguna Verde x 25 blocks	Goodwell Property Management Ltd	2022	Façade
Residential	Celestial Height x 11 blocks	Goodwell Property Management Ltd	2022	Façade
Commercial	InnoCentre	Hong Kong Science and Technology Parks Corporation	2020	Façade
Commercial	Bio-Informatics Centre	Hong Kong Science and Technology Parks Corporation	2020	Façade
Commercial	Hang Seng 113	Jones Lang LaSalle IP, Inc.	2023	Façade
Heritage	University Hall of HKU	Jones Lang LaSalle IP, Inc.	2019	Façade
Commercial	Metroplaza Roof Inspection	Kai Shing Management Services Ltd	2020	Façade

Building Type	Building Name	Client Name	Year of Completion	Product Type
Others				
Others	Tsing Yi Interchange x 3	AECOM	2023	Drone
Consulting	Base Station Inspection	CLP Innovation Enterprises Limited	2022	Consulting
Consulting	Crane Rope	Hip Hing Construction	On Going	Others
Consulting	Two Taikoo Place - Lift Shaft	Hip Hing Construction	2021	Lift
Commercial	International Commerce Centre (ICC) - Pumping - Bearing (renewal)	Kai Shing Management Services Ltd	Subscription	E&M
Commercial	International Commerce Centre (ICC) Vibration Subscription [2022-2023]	Kai Shing Management Services Ltd	2023	Consulting
Commercial	International Commerce Centre (ICC) Video Scan	Kai Shing Management Services Ltd	2022	Drone
Commercial	International Commerce Centre (ICC) Drone Video	Kai Shing Management Services Ltd	2022	Drone
Commercial	International Commerce Centre (ICC) Pumping Bearing	Kai Shing Management Services Ltd	2021	E&M
Commercial	Harbour North	Likon Technology	2021	Others
Government	Ma Hang Prison	Prudential Surveyors International Limited	2023	Drone
Escalator	Time Square	Schindler	On hold	Escalator
Lift	International Commerce Centre (ICC) – Bearing x 10	Schindler / Intertek	2022	Lift
Lift	International Commerce Centre (ICC) – Bearing PoC	Schindler / Intertek	2020	Lift
Lift	One Taikoo Place - Rope	Schindler / Intertek	2020	Lift
Consulting	Power Rail Monitoring - Renewal	HACTL	On going	Others
Consulting	Power Rail Monitoring	HACTL	2021	Others

Customer Testimonials

"What set RaSpect Intelligence apart was their remarkable AI platform. This significantly expedited the inspection process, saving us both time and resources."

Joel LEE

G&M Engineering Company Limited
Executive Director

"...I use RaSpect Inspectica™, an all-in-one platform that I find highly convenient and user-friendly. "

Dominic CHAU

Core Vision Surveyors Limited
Registered Professional Surveyor

" ...defects can be addressed early on, facilitating prompt maintenance arrangements and reducing the risk of potential hazards. "

Jeff NG

Kai Shing Management Services Limited
Senior Technical Services Manage

" ...we minimize greatly our interference to residents and tenants. In addition, we can utilize drone technology to inspect the structural integrity of our buildings."

Simon BAXTER

Great Eagle Holdings Limited
Managing Director, Development & Project Management

"...the system also automates paperwork processes and streamlines regulatory workflows. "

WONG Yue Ka, Edgar

Buildings Department Structural Engineer (Signboard Control 8)

Awards and Certifications (Shortlisted)

2022 KPMG China Leading PropTech50 in Asset Management, Operation and Services

Selected by Forbes Asia 100 to watch list

Silver Award of Global AI Challenge Competition for Building Cooling Load Prediction

The Most Inspiring AI CEOs to Watch in 2020

Tech Top 50 Industrial Engineering Award by Valuer AI in 2022

Winner of Hong Kong ICT Startup Gold Awards 2020

ISO 27001, ISO 27701, ISO 9001 Certified

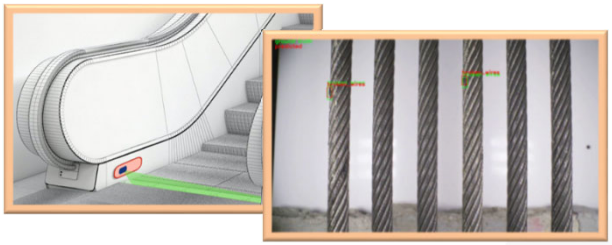
Winner of World Summit Awards 2019 in Smart Settlements & Urbanization

Red Herring Winner 2019 Asia Top 100

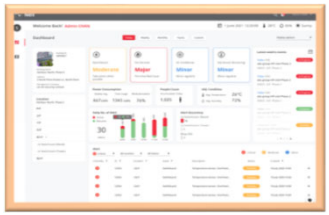
Winner of 2019 Hong Kong Rising Star Deloitte China Rising Star Program

Gold Medal Award Winner of 2nd Asia Exhibition of Inventions Hong Kong 2019

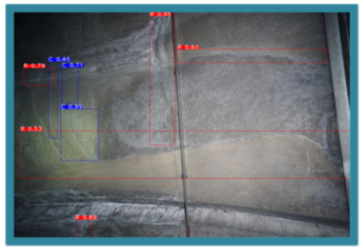
Rich Set of Smart City Solutions



Elevator / Escalator Functional Safety Monitoring



Smart Building Platform

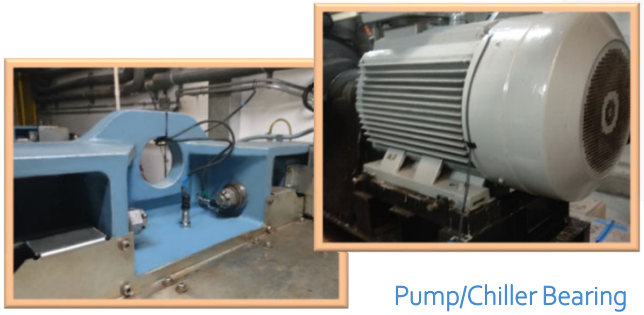


Tunnel Inspection

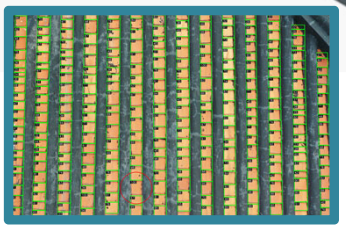
Pylon Tower / Radio Station Inspection

AI Façade & Piping Inspection

AI-Signboard Defect Detection



Pump/Chiller Bearing Monitoring



Heritage Inspection

Road Image Capturing

RaSpect

Serviceable Locations

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Bhubaneswar 751019

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