



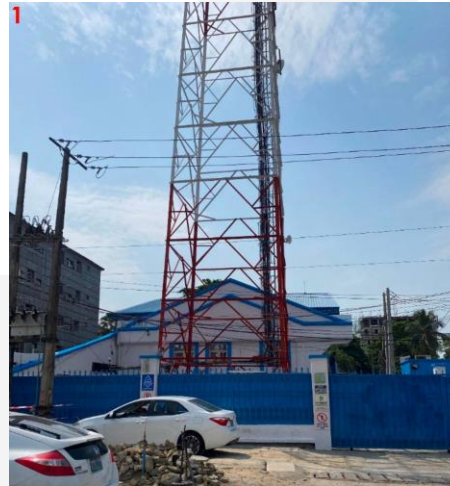
# Scaling Data Centres

**The Medallion Data Centre Journey  
and Insights for Future Growth**

**NgPIF 2023**



# How do you create the #1 Peering and Connectivity Datacenter from a run down Supermarket Building



# Carriers and ISPs Present at Medallion

Medallion's LOS1 is the leading connectivity hub in Western Africa with 70+ Carriers and Internet Service Providers

10 Fibre Owners Connecting to LOS1	10 Nigerian Connectivity Providers	50 Nigerian Internet Service Providers (ISPs)	7 Regional African Networks	8 International Networks	2 Internet Exchanges	5 Mobile Network Operators	7 Subsea Cable Systems
MTN	21st Century	21st Century	IMBL Telecom	Angola Cables	AFR-IX	MTN	<b>ACE:</b>
GLO1 Submarine Cables	Airtel Nigeria	9 Mobile	Interra Networks	AFR-IX	Dimension Data	Globacom	Dolphin Telecom; MTN; Orange
NatCom – SAT3	Backbone Connectivity Network	Airtel Nigeria Backbone Connectivity Network	Information Connectivity	Congo Telecom	MTN Global Connect	Airtel	
9Mobile	Broadbase	Billyronks Global	Internet Solutions Nigeria	Hoop Telecoms	Orange	9Mobile	<b>Equiano</b>
ACE Submarine	Isocel	Brainshare	IPXN Nigeria	Dolphine Telecom	PCCW Global	Ntel	Google
Phase3 Telecom	Phase 3 Telecom	CedarView	KKON Technologies	INQ.Digital (Vodacom)	SkyVision Global		
VDT	Layer 3	Choice2Mobile	Layer 3	Web4Africa	TI Sparkle		<b>GLO1:</b>
Airtel Nigeria	NatCom	CobraNet	MAFAB		WIOCC		GLO1 Submarine Cables
BroadBase	Suburban Fiber	Coloplus WS	Multidimension Tech				
MainOne	VDT Communication	Content & Access	NanoCom				<b>MainOne:</b>
AFL		Cool-Link Comms	Natcom				MainOne Cables
		CyberSpace	Netcom Africa				
		Congo Telecom	NGCOM Network				<b>NCSCS:</b>
		DotMac Tech.	Nmobile				HMN Tech-Mainone
		Dimension Data	Platinum Index				
		Estream Network	Proline				<b>SAT-3/WACS:</b>
		Fibre Edge	RouteLink				Orange; Angola Telecom; TI Sparkle; PCCW
		Global Performance Index	SpectraNet				
		GLO1 Submarine Networks	SWIFT Network				<b>WACS:</b>
		Hyperia	Teletronica				Angola Cables; Congo Telecom; MTN; Natcom; PCCW; Vodacom
		Hoop Telecoms	Telnet				
		INQ.Digital (Vodacom)	Timeless Network				
		Main-One	Trefoil Networks				
		MTN	VDT Communication				
			Winrok Nigeria				

Companies terminating fibre into the LOS1 facility.

Local telecommunication services

All ISPs with significant market share in Nigeria are present at LOS1.

Networks with low latency connections to other West African countries.

Leading International networks

The majority of the public peering traffic on the IXPN flows through LOS1.

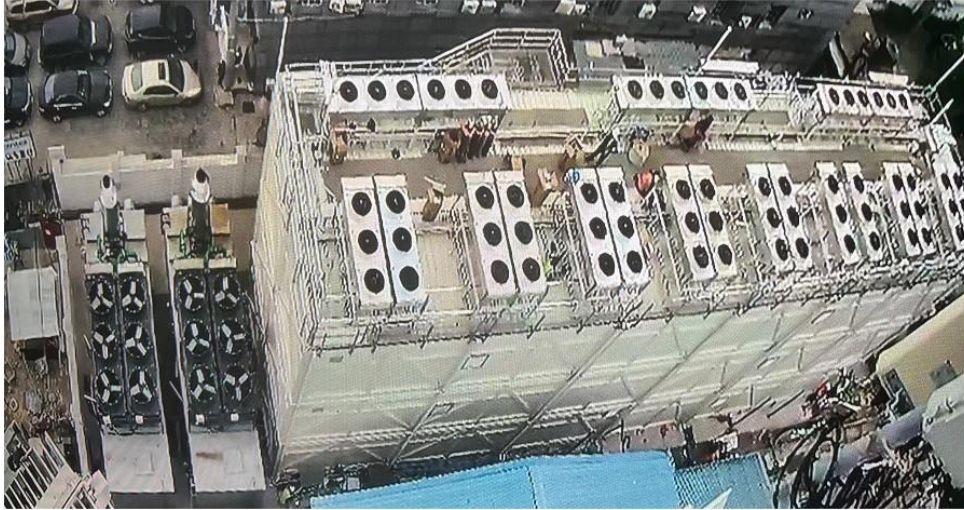
All 4 National Mobile Network Operators are present at LOS1.

All 7 Subsea Cable Systems are directly connected to LOS1.

# How do you create the #1 Peering and Connectivity Datacenter from a run down Supermarket Building



# Developed/Operational Facility- LOS 2 Data Center



<b>Floor</b>	<b>IT Load</b>	<b>Racks</b>
Ground	200 kW	50
First	400 kW	91
Second	400 kW	91
<b>TOTAL</b>	<b>1 MW</b>	<b>232</b>

## Key Features

- 232 racks, 1MW IT Load datacenter next to LOS1 datacenter in Victoria Island, Lagos
- Expand the peering and connectivity capacity currently available in LOS1
- Less than 1km from the Hyperscale LOS3 datacenter under development
- Redundant fiber connection to LOS1, LOS3, LOS20, LOS21
- Tier-3+ DLR Global operational standard

## Electrical

- Electrical IT system topology is in 2N configuration.
- Each Power room consists of 2 600 kW UPS system with VRLA batteries providing 5 min EOL at 1200 kW per side.
- Cooling technology is DX.
- Redundancy is N+1 in all rooms.
- 2x2650kVA generators.

## Racks

- Rack density: Up to 8kW
- PDU Model: 230V
- Dual Power Supply

# Some sample Medallion Awards including best connectivity DC Awards







**icolo.io**  
A DIGITAL REALTY COMPANY

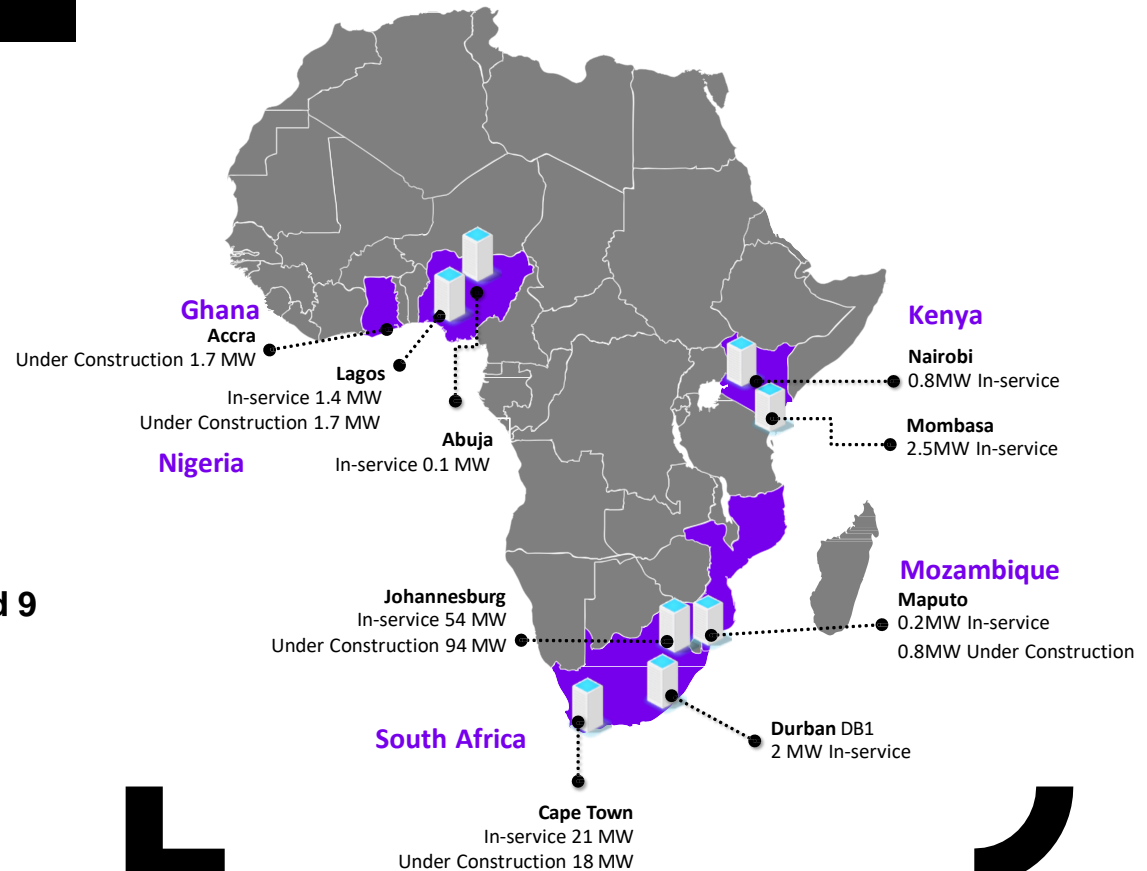
**MEDALLION**  
A Digital Realty and Pembani Remgro JV

**TERACO**  
A DIGITAL REALTY COMPANY

# The African Meeting Place for Companies, Technologies and Data

Digital Realty is present in 5 African countries and 9 metropolitan areas, serving a total of over 400 million Africans and countries totaling approximately 35% of the continent's GDP

- 80 MW In service
- 115 MW Under construction
- Total Investment in Africa to date amounts to approx. 2b USD

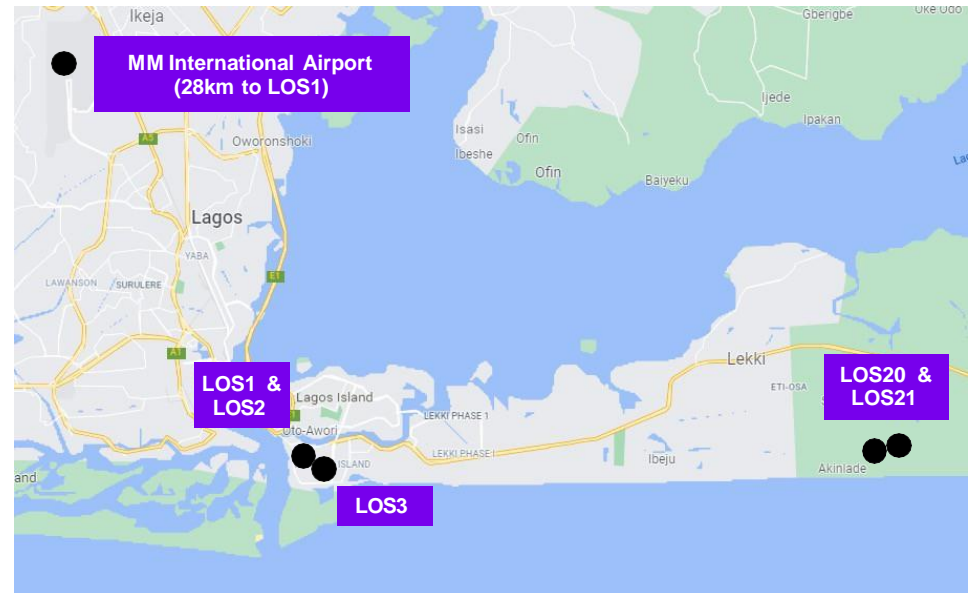




- 2004: Medallion Communications established in 2004
- Carrier neutral data center services started in 2006.
- Nigeria's #1 peering and connectivity point.
- Acquired by a JV between Digital Realty and Pembani Remgro in 2021.
- Operates data centers in Lagos and Abuja
- Rebranding to Digital Realty by October 2023

City	DC	Campus	MW	Status
Lagos	LOS1	Victoria Island	0.3	Active
Lagos	LOS2	Victoria Island	1	Active
Lagos	LOS3	Victoria Island	30	Planning
Lagos	LOS20	Lekki	CLS <sup>1</sup>	Active
Lagos	LOS21	Lekki	1.7	RFS Q4 2024
Abuja	ABV1	Wuse2	0.1	Active

Medallion's LOS1 data center is the most highly-connected site in Nigeria with 70+ Carriers and Internet Service Providers.

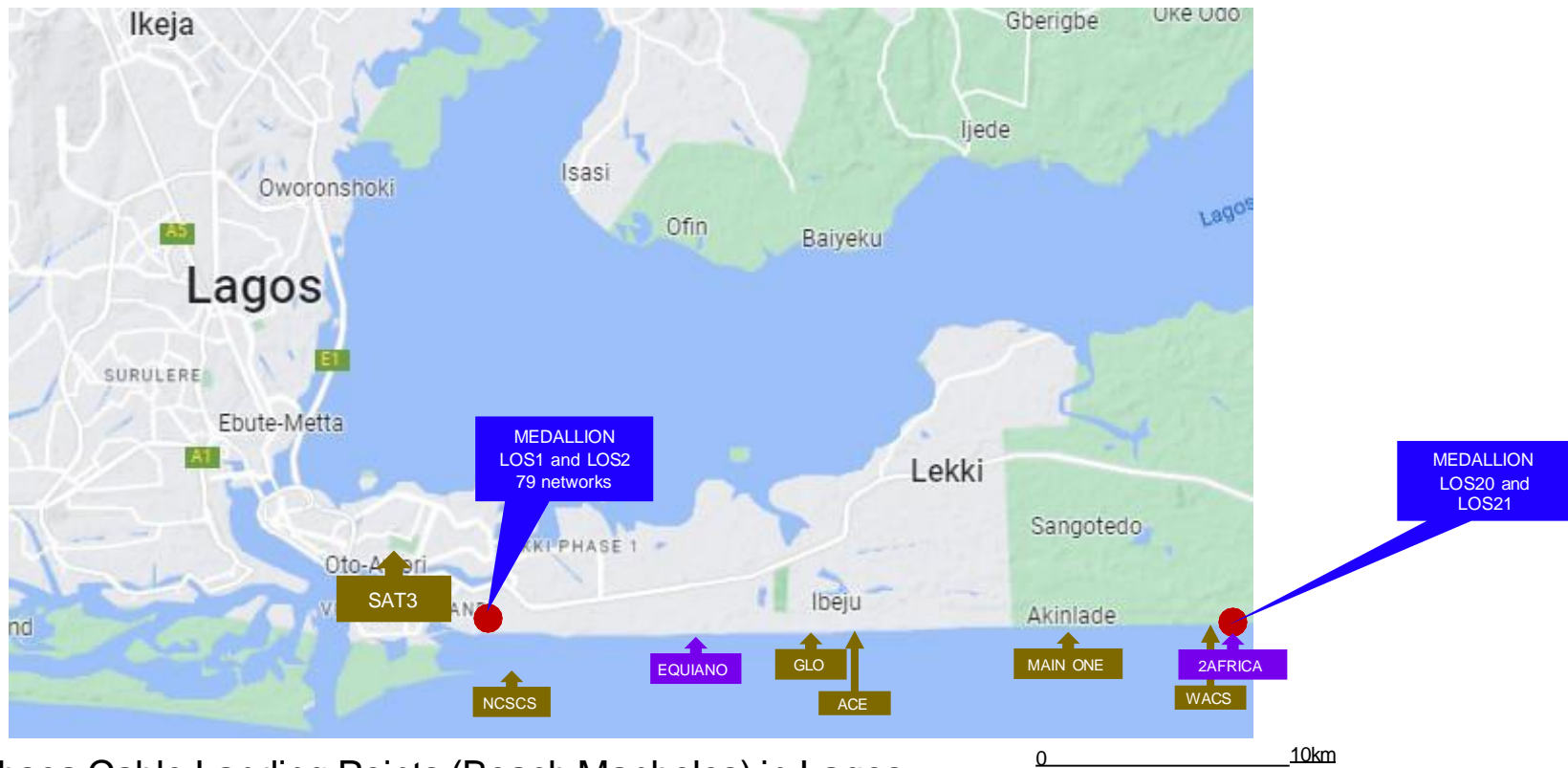


The new LOS2 will be adjacent to LOS1.

1. CLS = Cable Landing Station

# Project/Site under Design/Construction/Cx - LOS20 & LOS21 (Also called LKK1 & LKK2)

## Location and Adjacency(s)

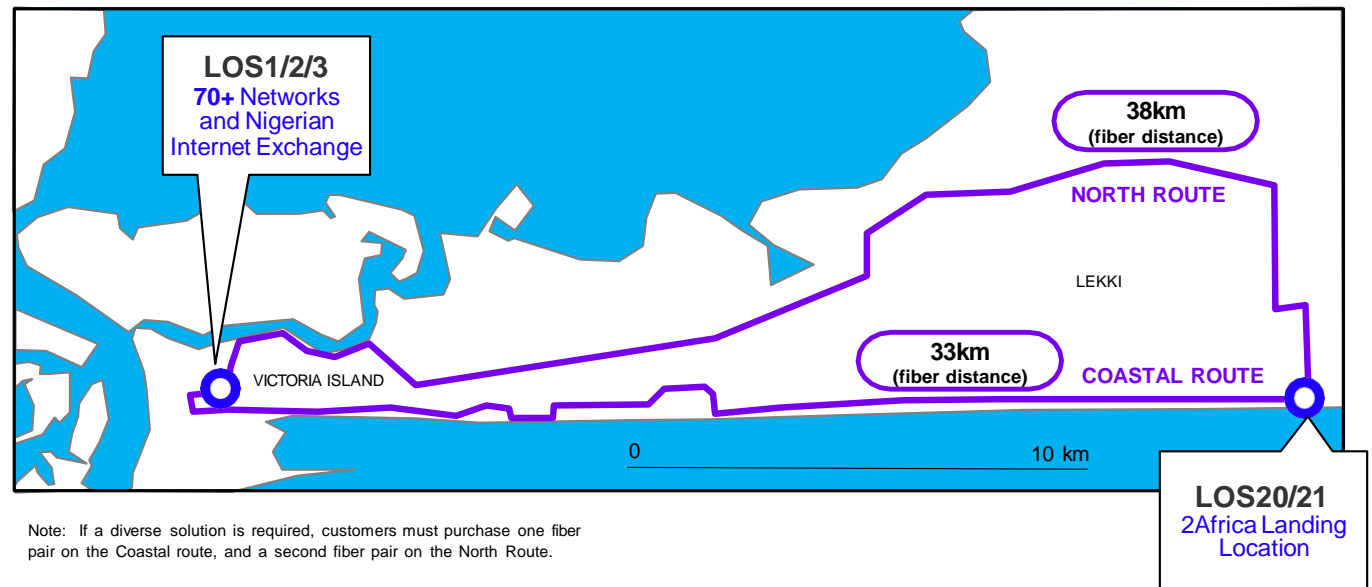


Subsea Cable Landing Points (Beach Manholes) in Lagos.

# Medallion's Metro Connect Service in Lagos

## Notes:

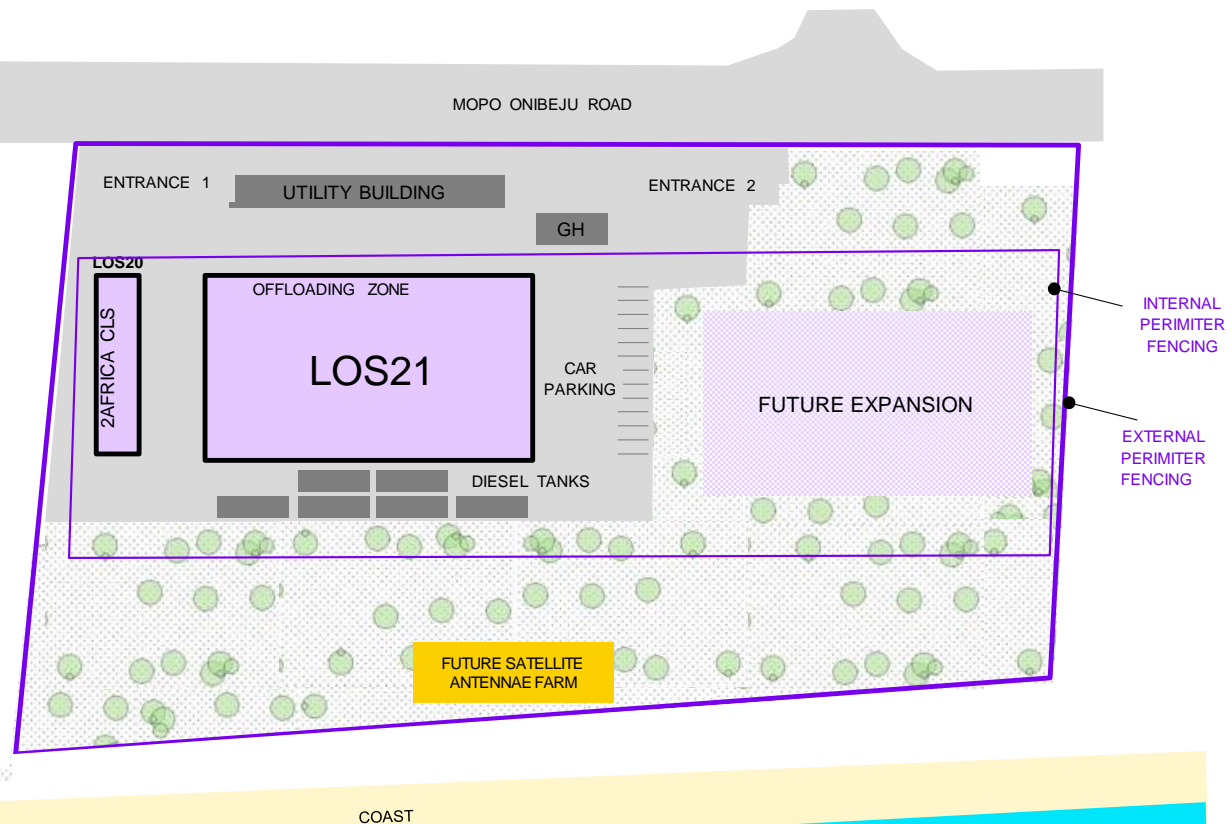
- Diverse Routes
- Dark Fiber
- 48 fiber pairs per route (easily scalable)
- Fiber Distances:
  - Coastal route: 33km
  - North route: 38km
  - kmz available on request



# Project/Site under Design/Construction/Cx - LOS20 & LOS21 (Also called LKK1 & LKK2)

**LOS21** (1.7MW, 1,100m2 of Customer IT space)

- Adjacent to 2Africa CLS (LOS20)
- Connected to LOS1 and LOS2 via diverse Metro fiber
- Diverse Meet-me rooms
- Multiple local fiber providers present
- Provision for future Satellite antennae farm
- Emerging connectivity community seeking proximity to 2AFRICA subsea cable.
- Target RFS date is Q4 2024 for LOS21

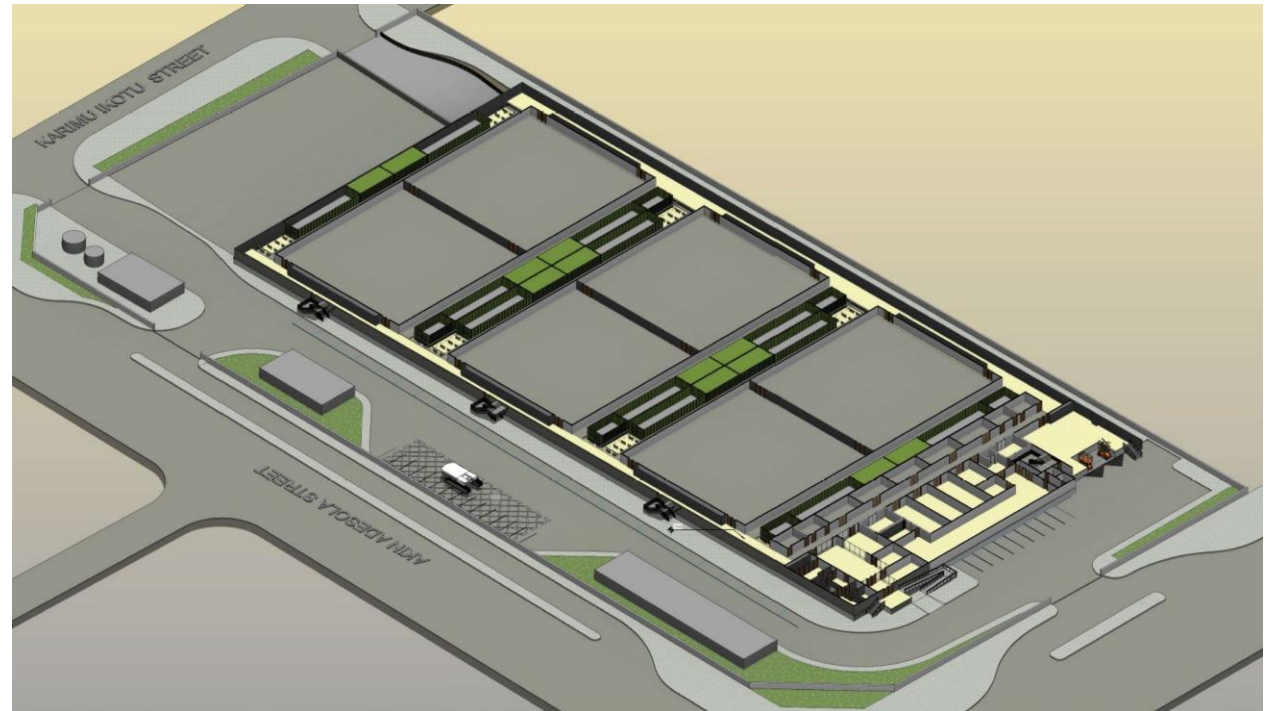


# Project/Site under Design/Construction/Cx - LOS20 & LOS21 (Also called LKK1 & LKK2)



## Project/Site under Design/Construction/Cx – LOS3

- ❖ Capacity for 30MW IT datacenter in Victoria Island
- ❖ Expand the peering and connectivity capacity currently available at LOS1/LOS2 (largest peering and connectivity hub in West Africa)
- ❖ Less than 1km from LOS1/LOS2 campus in Victoria Island
- ❖ land purchase completed
- ❖ Design ongoing
- ❖ RFS date depending on customer request. Current target is Q1 2025 for Phase1 capacity



# Disclaimers and Confidentiality

## Disclaimer

- The information in this document ("Information") is meant to provide indicative information on current and future available capacities by Digital Realty Trust LP or any of its affiliate's (hereinafter: "Digital Realty") for the provision of data center services. The Information provided is subject to changes or updates without any obligation on the part of Digital Realty to provide notice thereof. Digital Realty presents this Information "as is" and makes no representations or warranties about the accuracy or suitability of this Information and accepts no liability of any nature resulting from reliance upon the Information contained in this document. Digital Realty obligations with respect to its products and services are governed solely by the duly signed agreements under which they are provided.

## Confidentiality / Use

- The Information in this document is submitted to you for potential projects pursuant to which Digital Realty may provide data center products and services on the condition that it is kept confidential by you and read only for the purpose of your project requirements and the related Digital Realty facilities.

## Intellectual property rights

- All relevant intellectual property rights in this document vest in Digital Realty. For the avoidance of doubt, ownership of relevant intellectual property rights in any technology or procedures described in this document remain the property of Digital Realty.

## Forward-Looking Statement/ Safe Harbour Statement

- The Information contains forward-looking statements which is based on current expectations, forecasts and assumptions that involve risks and uncertainties that could cause actual outcomes and results to differ materially. For a list and description of such risks and uncertainties, see the reports and filings by the company with the U.S. Securities and Exchange Commission. Digital Realty disclaims any intention or obligation to update or revise any forward-looking statements, whether as a result of new information, future events or otherwise.



Thank you

