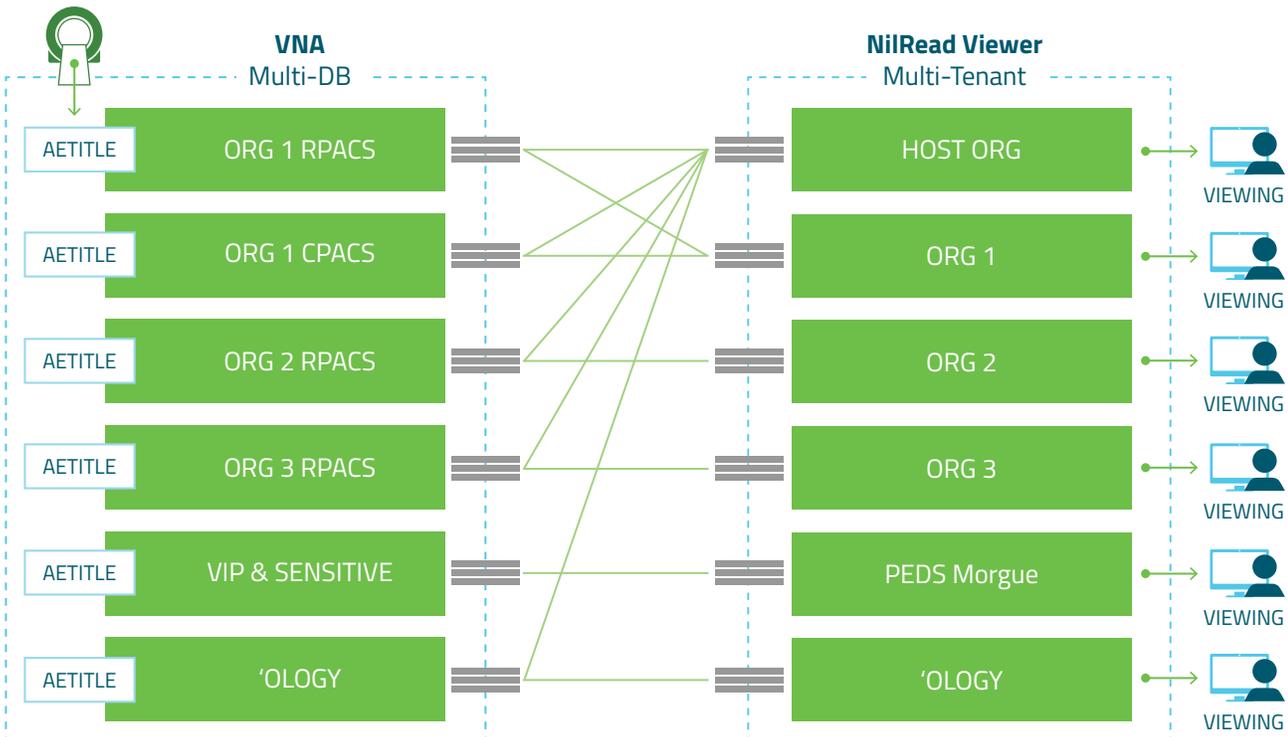# NilRead Multi-Tenant Architecture

Manage multiple sites to provide enterprise-wide viewing governance

Healthcare organizations express the need to provide clinical and enterprise viewing governance. Whether it be to administer viewing capability by system, organization, department or role, multi-tenancy viewer architecture is essential. In addition, facilitating interoperability between multiple disparate systems such as the electronic health record (EHR), radiology PACS, cardiology PACS or other specialty applications, without separate viewer instance, necessitates a multi-tenant architecture that Hyland Healthcare can uniquely provide.

NilRead supports multi-tenant configurations

NilRead enterprise viewer promotes and supports a multi-tenancy architecture. NilRead can facilitate multiple operations contexts — one per tenant. Each tenant is provided with its own virtual NilRead site. These virtual NilRead sites share the same physical NilRead infrastructure, including front-end and back-end servers. Tenants are provided with a dedicated database. By default, tenants do not have access to each other's data unless trust relationships are established.

Below are simplified illustrations of the NilRead multi-tenant architecture versus that of a single-tenant architecture.

Benefits of multi-tenant architecture

▸ Viewer tenants can be connected to a single or multiple vendor neutral archive databases or AE Titles

▸ Viewer tenants are completely user definable

▸ Realms are created to create and govern trusted relationships

▸ Essential for large healthcare systems as well as departmental management

▸ Supports governing viewing ability based on site-specific criteria

▸ Create and manage viewer databases independently

▸ Provide privileges based upon user, group, tenant or system

▸ Provides highly sequestered, open and/or hybrid viewing governance of clinical information

▸ Manage disparate EHR interoperability and image enablement

VNA
Multi-DB

NilRead Viewer
Multi-Tenant

AETITLE	ORG 1 RPACS
AETITLE	ORG 1 CPACS
AETITLE	ORG 2 RPACS
AETITLE	ORG 3 RPACS
AETITLE	VIP & SENSITIVE
AETITLE	'OLOGY

HOST ORG	VIEWING
ORG 1	VIEWING
ORG 2	VIEWING
ORG 3	VIEWING
PEDS Morgue	VIEWING
'OLOGY	VIEWING

NilRead™
by Hyland

Limitations of single tenant architecture

- Viewer must be connected to all VNA databases to render images
- Assigning viewing ability by VNA database is impossible without setting up multiple viewer instances
- See one, see all architecture is not optimal
- Lacks site-administered viewing goverance

- Does not address entering into, managing and possibly ending, business and clinical relationships
- Does not facilitate sequestering of information such as VIP or sensitive
- Does not manage disparate EHR interoperability and image enablement

VNA
Multi-DB

AETITLE	ORG 1 RPACS
AETITLE	ORG 1 CPACS
AETITLE	ORG 2 RPACS
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Viewer
Single-Tenant

TENANT DB

VIEWING

NilRead™
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