



# Annual Report 2016-17

**A Journey towards the end of HIV epidemic**

**ODISHA STATE AIDS CONTROL SOCIETY**

**Health & Family Welfare Department, Govt. of Odisha**



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**National AIDS Control Organisation**  
India's Voice against AIDS  
Ministry of Health & Family Welfare, Government of India  
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जानें समझे, जुग-जुग जीएं

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**Published by:**  
Odisha State AIDS Control Society  
Dept. of Health & Family Welfare  
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## MESSAGE

It gives me immense pleasure to know that Odisha State AIDS Control Society (OSACS) is going to publish its Annual Report 2016-17.

The world has agreed to meet a set of global targets by 2030 as part of UNAIDS Fast-Track strategy to end the AIDS epidemic as a public health threat. Today HIV/AIDS is recognized as a global epidemic, affecting all levels of society and posing serious barriers to our social and economic development. The stigma and discrimination associated with HIV/AIDS have shattered the lives of communities, with a severe toll on the socioeconomically marginalized, children and women.

Till date no cure is available for HIV and therefore promoting preventive measures is the only way to protect ourselves from the virus. HIV and AIDS being a public health concern has demanded worldwide attention. In this regard OSACS has relentlessly worked towards combating its spread by spearheading the HIV Prevention and Care, Support and Treatment programmes in the State.

This Annual Report provides snapshots of how OSACS under National AIDS Control Program (NACP) is doing all the activities as per National AIDS Control Organisation (NACO) guidelines and its stakeholders worked together to strengthen the HIV response. Key achievements, statistics and state results are highlighted for each priority area. New HIV/AIDS infection is now declining in Odisha as per analysis of different data sources. In the Annual Report all the activities conducted throughout the year 2016-17 have been tried to put together.

I wish publication of this Annual Report 2016-17 all success in achieving its goal.

*Pratap Jena*  
(Sri Pratap Jena)





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## MESSAGE

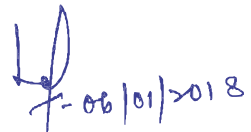
**Dr. Pramod Meherda, IAS**  
Commissioner-Cum-Secretary  
Health & Family Welfare Department  
Government of Odisha  
Bhubaneswar-751001

It gives me immense pleasure to note that Odisha State AIDS Control Society is going to publish the Annual Report 2016-17 on the eve of National Youth Day.

The State is marching ahead to fulfil the targets of UNAIDS global commitment of “90-90-90”, which means 90% of all people with HIV should be diagnosed; 90% of people with HIV diagnosed should receive ART and 90% of those on ART should reach suppressed viral load by 2020. Odisha is moving fast towards this goal. We are hopeful to achieve it all these targets through a sincere and dedicated team work and use of advanced technology.

In this Annual Report, activities of different years have been analyzed for various indicators which show a decline of HIV prevalence and increase in uptake of treatment services. In our endeavour to bring down incidences of HIV & AIDS, I commend the role of NGO partners and the youth in particular who have played a major role in bridging the last mile gaps.

I wish the publication of this Annual Report all success in achieving its objectives.

  
( Dr. Pramod Meherda)





## Foreword

### Dr. Ajit Kumar Mishra

Additional Secretary  
Health & Family Welfare Department  
& Project Director, OSACS  
Govt. of Odisha

To control HIV/AIDS, National AIDS Control Program NACP was initiated in India. Importance was given to create awareness during NACP-I,II and in NACP III for infrastructure development followed by quality of services in close association to existing health services both Govt and Private sector in NACP IV. To achieve the goal “Zero new HIV Infection, Zero Discrimination and Zero AIDS Related Deaths”; in OSACS we were able to carry out all the activities of National AIDS Control Program during the financial year 2016-17. Now HIV / AIDS in Odisha is showing a decline trend of new infection and OSACS is trying its level best to achieve the goal. To achieve the goal, care has been taken for intersectoral coordination and collaborative activities are going with all the line departments. Apart from that HIV and RPR testing, Care and Support among pregnant women, HIV-TB cross referral have been increased in the state.

In this Annual Report 2016-17 the program activities during the year have been placed with different indicators as a ready reckoning of a decline in HIV prevalence of the state and increase of Care Support and Treatment.

I wish the publication of this Annual Report all success in achieving its goal.

(Dr. Ajit Kumar Mishra)





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### Abbreviations

AIDS	Acquired Immuno-Deficiency Syndrome
ANC	Antenatal Clinic
ANM	Auxiliary Nurse Midwife
ART	Antiretroviral Therapy
ASHA	Accredited Social Health Activist
BCC	Behaviour Change Communication
BCSU	Blood Component Separation Unit
BSC	Blood Storage Centre
BSD	Basic Services Division
BSS	Behaviour Surveillance Survey
CBO	Community Based Organisation
CSC	Community Support Centre
CD4	Cluster of Differentiation 4
CHC	Community Health Centre
CLHIV	Children Living with HIV
CST	Care, Support and Treatment
DAC	Department of AIDS Control
DAPCU	District AIDS Prevention & Control Unit
DIC	Drop in Centres
DP	Delivery Point
DSRC	Designated STI/RTI Clinic
EID	Early Infant Diagnosis
EQAS	External Quality Assessment Scheme
FICTC	Facility Integrated Counselling & Testing Centre
FSW	Female Sex Workers
GIPA	Greater Involvement of People with HIV/AIDS
GIS	Geographic Information System
HIV	Human Immunodeficiency Virus
HMIS	Health Management Information System
HRG	High Risk Group
HSS	HIV Sentinel Surveillance
IBBS	Integrated Biological & Behavioural Surveillance
ICF	Intensified tuberculosis Case Finding
ICMR	Indian Council of Medical Research
ICTC	Integrated Counseling and Testing Centre
IDU	Injecting Drug Users
IEC	Information, Education and Communication
JAT	Joint Appraisal Team
LAC	Link ART Centre
LFU	Lost to Follow-up
LWS	Link Worker Scheme
M & E	Monitoring and Evaluation
MOHFW	Ministry of Health & Family Welfare
MSM	Men who have Sex with Men
NACO	National AIDS Control Organisation

NACP	National AIDS Control Programme
NABL	National Accreditation Board for Testing and Calibration Laboratories
NGO	Non-Government Organisation
NICED	National Institute of Cholera & Enteric Diseases
NHM	National Health Mission
NRL	National Reference Laboratory
NTSU	National Technical Support Unit
OI	Opportunistic Infections
ORW	Out Reach Worker
OST	Opioid Substitution Therapy
PEP	Post-Exposure Prophylaxis
PHC	Primary Health Centre
PLHIV	People Living with HIV
PPP	Public Private Partnership
PPTCT	Prevention of Parent to Child Transmission
PT	Presumptive Treatment
PRI	Panchayati Raj Institution
RCH	Reproductive and Child Health
RI	Regional Institute
RNTCP	Revised National Tuberculosis Control Programme
RRC	Red Ribbon Club
RRE	Red Ribbon Express
RSBY	Rashtriya Swasthya Bima Yojna
RTI	Reproductive Tract Infections
SACS	State AIDS Control Society
SBTC	State Blood Transfusion Council
SIMS	Strategic Information Management System
SIMU	Strategic Information Management Unit
SRL	State Reference Laboratory
STD	Sexually Transmitted Diseases
STI	Sexually Transmitted Infections
STRC	State Training & Resource Centre
TAC	Technical Advisory Committee
TG	Transgender
TI	Targeted Interventions
TRG	Technical Resource Group
TSU	Technical Support Unit
UNDP	United Nations Development Programme
UNICEF	United Nations Children's Fund
USAID	United States Agency for International Development
VBD	Voluntary Blood Donation
WHO	World Health Organisation
WBFPT	Whole Blood Finger Prick Test

**N**ational HIV/AIDS control Programme was operational in the state of Orissa since 1992. The first phase of National AIDS Control Programme from 1992-97 was directly implemented through Directorate of Health Services, Orissa. Since 1997 till 2004, it was being implemented through State AIDS Cell (SAC). In July, 2004, Orissa State AIDS Control Society (OSACS) was registered under Society Registration Act of 1860. NACP-I was from 1994-99, NACP-II was from 1999-2006, NACP-III was from 2006-2012 and NACP –IV is in place from 2012-2017.

#### **NACP I:**

Objectives: Slow down the spread of HIV to reduce future morbidity, mortality and the impact of HIV/AIDS by initiating a major effort in the prevention of HIV transmission.

#### **NACP II:**

Objectives: Reduce the spread of HIV infection and to strengthen India's capacity to respond to HIV/AIDS on a long-term basis.

#### **NACP III:**

Objectives: To halt and reverse the epidemic in India over five years by integrating programs for Prevention, Care, Support and Treatment.

#### **NACP III was based on a four pronged strategy:**

1. Prevention of new infections in high risk groups and general population through:
  - a. Saturation of coverage of high risk groups with Targeted Interventions.
  - b. Scale up interventions among general population
2. Providing greater care, support and treatment to a larger number of People Living with HIV AIDS.
3. Strengthening of infrastructure systems and human resources in prevention care, support and

treatment programs at the district, state & national level.

4. Strengthening the nationwide strategic information management system

#### **NACP IV:**

##### Objectives:

1. Reduce new infections by 50% (2007 Baseline of NACP-III)
2. Comprehensive care, support and treatment to all persons living with HIV/AIDS

##### **Components:**

###### Component 1:

Intensifying and Consolidating Prevention services with a focus on HRG and vulnerable populations

- Scaling up coverage of TIs among HRGs
- Scaling up of interventions among other vulnerable populations

###### Component 2:

Expanding IEC services for General population and High risk groups with a focus on behaviour change and demand generation

###### Component 3:

Comprehensive Care, Support and Treatment

- Greater demand for 2nd line ART, OI management
- The program will enhance activities to reduce stigma and discrimination

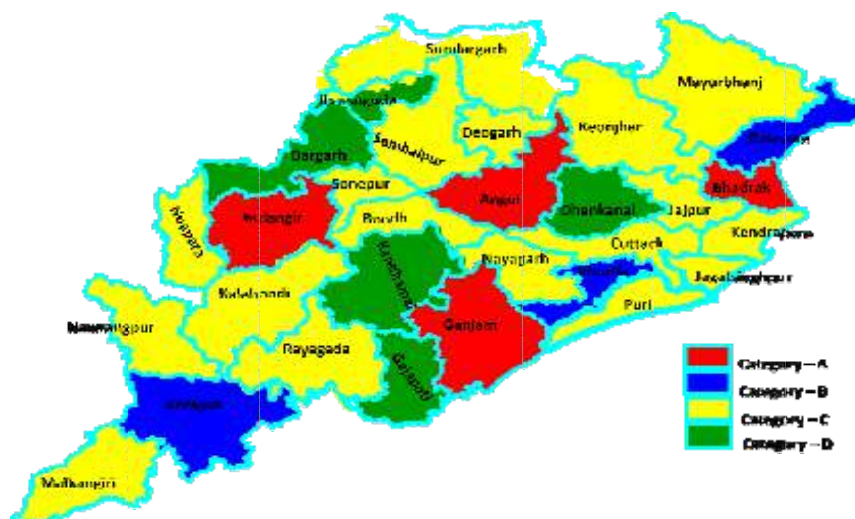
###### Component 4:

Strengthening institutional capacities

###### Component 5:

Strategic Information Management Systems (SIMS): Documentation, manage and disseminate evidence and effective utilization of programmatic and research data.

Figure 1: Categorization of Districts as per HIV Sentinel Surveillance 2006



### Targeted Intervention

Targeted Interventions are a specific set of interventions under National AIDS Control Program (NACP) targeted towards High-Risk Group (HRG) population i.e. Female Sex Workers (FSW), Injecting Drug Users (IDUs), Men having Sex with Men (MSM), TG/Hijra and Bridge populations like Migrants and Truckers. OSACS initiated the Targeted Intervention Programme among HRGs and other vulnerable population with 6 projects in 2001 to control the HIV/AIDS epidemic in Odisha. The main components of the TI projects are; Behaviour Change Communication, Bi-annual HIV testing & RPR for Syphilis testing, STI/RTI Treatment, Condom Promotion, Enabling environment & Community mobilization.

Objective of the Targeted Interventions:

1. Provision of services to target population in order to practice safe behaviours
2. Creation of enabling environment to overcome obstacles and to support practice of safe behaviour.
3. Empowerment for advocacy and sustainability plan (Community mobilization).

Mapping of HRG population and bridge population was being conducted in India by Durbar Mahila Samity during 2008-09 and it is considered as baseline mapping till date. There was a mapping of HRG by UNDP in Odisha and mapping of TG and Hijra population conducted by National Institute of Epidemiology (NIE) Chennai during 2013.

Table 1: Mapping of vulnerable population:

Typology	Mapping	Coverage	Percentage of coverage
FSWs	12,031	11403	94.78
MSM	4,230	2723	64.37
IDUs	2,564	2555	99.64
TGs/ Hijra	7,854	2160	27.5
Truckers		11525	
In -Migrants	29,373	106081	361.15

As per survey done by Durbar Mahila Samanwaya Committee (DMSC), 2009

\* TG / Hijra population as per mapping done by NIE, Chennai, 2013

Figure 2: Coverage of HRG population under TI project

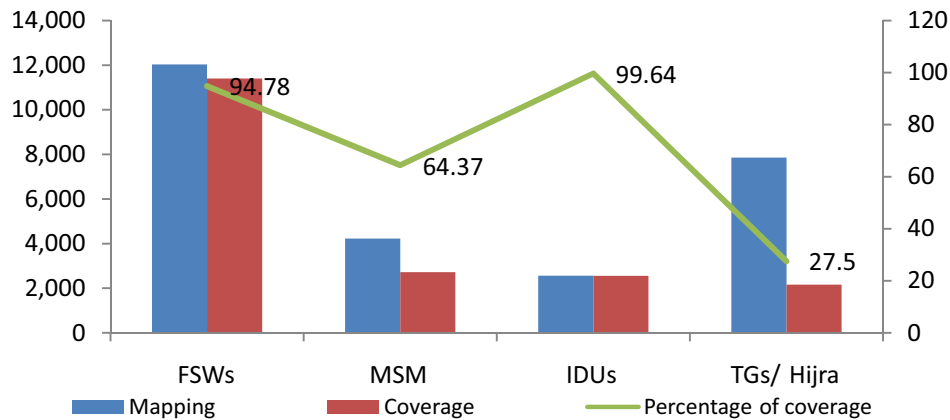


Table 2: Needle syringe demand and exchange in IDU Projects 2016 - 17:

District	Name of TI Project	Target Population	Syringes			Needles		
			Demand	Distribution	Return	Demand	Distribution	Return
Baragarh	RYS	350	109091	99466	73194	157554	143766	105410
Cuttack	OMRAH	350	110671	97695	81268	96465	90926	78910
Khordha	Lepra Society	650	174988	154549	130778	97290	81731	75681
Khordha	VJSS	250	65024	55687	44949	33013	28448	24431
Sambalpur	IRDMS	300	86713	82804	51552	39472	38201	24234
Puri	Hope Foundation	200	67507	57685	40640	51200	50607	35251
Deogarh	Bikalpa Bikash	150	35823	33108	26484	59488	54890	41461

Table 3: Targets and Physical Achievement of TI Program, Odisha, 2016 - 17:

Typology	Number of TI Projects		Population Coverage				Condom		
	Existing	Proposed	Achieved	Estimated	Existing	New target in AAP	Achieved	Demand	distribution
FSW	9	1	12	12031	10500	60	11403	10493 83	98701 3
MSM	2	1	2	4230	2585	0	2723	16907 4	16443 6
TG	0	5	1	7854	250	1250	2160	96486	10234 0
IDU	5	1	6	2564	2250	200	2555	13981 2	12455 4
Core Composite	21	5	21	0	0	0	0	27717 15	20555 48
Trucker	0	2	2	0	10000	10000	11525	NA	NA
Destination Migrants	9	1	9	29373	92000	****	106081	NA	NA
Total	46	16	53					42264 70	34338 91

\*\*\*\* No new TI came on board.



Figure: 3 Hotspot level meeting SAKHA, TG TI Bhubaneswar



### Opioid Substitution Therapy (OST):

For harm reduction among the Injecting drug users Opioid Substitution Therapy (OST) centers have been established in different hospitals near IDU TI Project areas that is DHH Puri, Psychiatry Department of Psychiatry SCB Medical College Cuttack, DHH Sambalpur and in one NGO based organization at VJSS, Old town, Bhubaneswar. In these centers sub-lingual Buprenorphine tablets are provided to the IDUs under direct supervision of the medical officer ; so that use of syringe needle is being reduced and behavioural change communication is adopted for cleaning of the IDU. The aim and objective is to reduce the use of syringe and needle and have a chance for behavioural change and at the end not to use injecting drugs further.

Table 4: Retention of IDU for OST

Sl No	District	OST Centre	Ever Registered	Treatment Completed	Retention till date
1	Cuttack	SCB MCH	54	0	51
2	Puri	DHH Puri	84	4	13
3	Khurda	VJSS IDUs TI	231	64	86
4	Sambalpur	DHH Sambalpur	30	0	1

### Challenges:

1. Retention in OST: IDU has to go to the OST center every day and to take the tablet under direct supervision and it needs strong family counseling.
2. Difficult to change injecting behavior among IDU; because after behavior change & OST again they switch over to injection practice due to friend circle.

### Link Worker Scheme (LWS):

The core and bridge populations are being intervened in the townships by the TI Projects and a lot of core and bridge population remain back in the rural areas. They remain scattered in the rural area and they are vulnerable to HIV due to low knowledge of the same. In the rural areas there are a lot of migrants and they return back to their village after being infected in the destination and they might have high risk behavior. There are the spouses of migrants in the villages who remain back. The PLHIV in the rural areas sometimes are not registered or remain in a loss to follow up condition. To address such issues in rural areas the Link worker Scheme has been initiated. In this program they work in identified highly vulnerable blocks.

In a simpler way; it is to reach out to HRGs and vulnerable men and women in rural areas with information, knowledge, skills on STI/HIV prevention and risk reduction by:

- Increasing the availability and use of condoms among HRGs and other vulnerable population.
- Establishing referral and follow-up linkages for services including treatment for STIs, testing and treatment for TB, ICTC/PPTCT services, condom promotion, HIV care and support services



including ART, PLHIV line listing, and LFU tracking.

- Creating an enabling environment for PLHA and their families by reducing stigma and discrimination through interactions with existing community structures /groups, e.g. Village Health Committees, SHG, PRI, etc.
- More specifically, the scheme aims to cover the population groups that are most at risk and are most vulnerable to HIV infection as well as persons living with HIV/AIDS.



Fig: 4 Activities of Link worker Scheme

Table: 5 Achievements of the Link worker Schemes.

District	District Implementing Agency	Line listing of Vulnerable people 2016-17							ANC	Referral of suspected TB	Support to PLHIV	Tested for HIV	HIV +ve detection
		FSW	IDU	MSM	TG	Migrants	Truckers	Other vulnerable population					
Cuttack	USS	217	0	98	15	2331	628	4416	1142	80	62	5752	6
Ganjam	ARUNA	99	0	151	1	7834	212	5351	4444	60	299	7977	41
Khurda	KNP+	325	1	100	0	4675	195	5144	384	58	67	5941	8
Nuapada	SAI	213	0	31	0	6273	424	3485	2585	229	62	5498	8
Puri	AVA-Puri	295	6	35	7	5925	54	1150	709	36	68	4069	6
Sundergarh	AVA-Sundergarh	403	0	0	1	3197	353	3602	1485	108	21	4030	5
	Total	1552	7	415	24	30235	1866	23148	10749	571	579	33267	74

Disease Control (CDC) has approved a three year program of the India

### NIRANTAR Program

The Presidents Emergency Plan for AIDS Relief (PEPFAR) – Centre for

HIV/AIDS Alliance called ‘Nirantar’ under the Local Capacity Initiative aims to enhance the capacities of CSOs and

other local institutions to improve access to HIV prevention, care and treatment continuum services including social protection schemes in an enabling environment (legal & social) for Key Populations (KPs) such as Female Sex Workers (FSW), Men who have Sex with Men (MSM), Transgender and Hijra population (TG&H) and Injecting Drug User (IDU). As per the approval from National AIDS Control Organization (NACO), Nirantar will be implemented in three states of Chhattisgarh, Odisha and Madhya Pradesh. The project Nirantar will focus towards capacitating frontline workers of Civil Society Organizations (CSOs), implementing government funded Targeted Intervention (TI) projects, healthcare service providers and key members of the KP community thereby increasing access to healthcare services and various social entitlement schemes/services offered at the state level. The activities of Nirantar are designed to complement and add value to the existing NACP at state level.

The objectives of Nirantar program are:

- To carry out data analysis for key population groups to effectively strategize prevention, care and treatment interventions and to equip evidence based monitoring more over to establish GIS maps in the three states.
- To enhance the skills of Targeted Intervention (TI) NGOs/CBOs outreach team including peer educators, members of community structures (Crisis management teams, project advisory and other committees) and health care providers for improving access, coverage and quality of prevention, continuum of care and treatment services for key populations.
- To facilitate access to social protection schemes and health services through establishing linkages with relevant department and agencies such as Social Welfare

Department, Women and Child Development, Rural Development, Panchayat Raj, Education and Health department for key populations.

- To implement innovative strategies for cost effectiveness and efficient coverage of KPs including ensuring HIV prevention to care and treatment services.

**Fig : 5 Training by NIRANTAR**



#### **Achievements:**

1. Sensitization of healthcare providers: 18 health institutions of Odisha; BMC Hospital Bhubaneswar, Capital Hospital Bhubaneswar, DHH Khordha, ESI Hospital Bhubaneswar, CHC Balakati, Khurda; CHC Girisola Ganjam, City Hospital Berhampur, Gopalpur PHC, CHC Kantabanjhi Bolangir, DHH Balangir, DHH Angul, DHH Bhadrak, CHC Basudevpur, CHC Chhendipada Angul; M.K.C.G. Medical College Berhampur, SDH Chatrapur, SDH Talcher and SDH Titlagarh and CHC Muribahal. 1239 hospital staffs (Medical officers, staff nurse, ANM, pharmacists and laboratory technicians) from those hospitals were sensitized regarding HIV/AIDS.
2. Mentoring support was provided to nine TIs; NUHASS Bhadrak, OPUS Khordah, AIRA Dhenkanal, Parivarttan Malkangiri, PENCODE Puri, SEWAK Sundargarh, DAPTA Kalahandi, SAI Balangir and Natures Club Keonjhar.

- Nirantar program in collaboration with OSACS conducted a compendium of Social Protection Schemes of different line departments and “A Handbook of Social Protection Schemes” was launched on March 24, 2017 during World TB Day organized by Dept of TB, H&FW, Govt of Odisha. In the book all the social benefit schemes for PLHIV, all the formats and the process of getting the benefit has been put together.

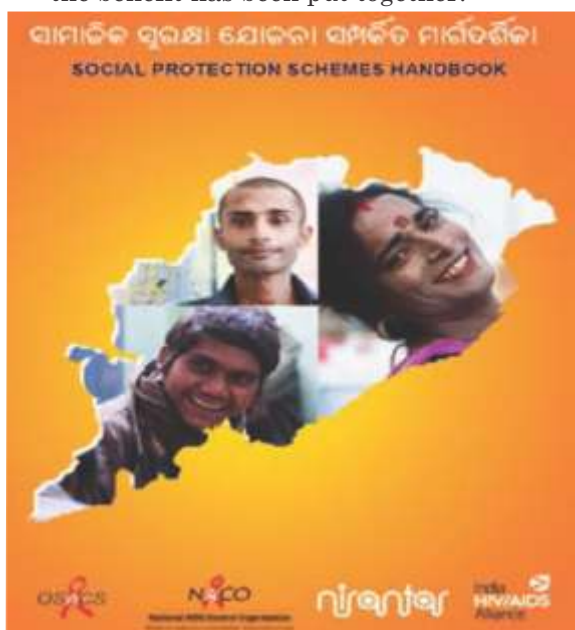


Fig 6: Book on Social Protection benefits for PLHIV.

Table 6: existing systems and structures ELM has enhanced the coverage of vulnerable informal workers linked with industries using existing structures and systems of the industries; also ELM demonstrated effective tracking of migrant workers who tend to show high risk behavior, which may lead to HIV/AIDS infection. ELM led the industries to be responsible for health and health awareness of its employees.

OSACS/TSU supported the employers to strengthen the HIV/AIDS services, which have provided holistic approach in reducing the vulnerability towards the disease and sustainability of the program.

With OSACS 20 industries signed MOU and in each industry a nodal officer was nominated and the Nodal officers were made responsible to form core committees comprising members from other departments (HR, CSR, safety, Medical and environment) of their industry and a member from OSACS. Further 2 sessions of training of trainers (TOT) were conducted during the financial year 2016-17.

### Employer Led Model (ELM)

Table 6: Activities under ELM

S. No	District	No of industries partnered under ELM	Popul covered through ELM	HIV counsel and tested	Condom outlets, in & around industry
1	Angul	1	43390	3189	19
2	Dhenkanal	4	10486	10	37
3	Jagatsingpur	1	594	339	7
4	Jajpur	3	12101	104	14
5	Jharsuguda	3	3498	1202	0
6	Sambalpur	3	8443	1843	20
7	Sundargarh	3	1684	65	0
9	Rayagada	1			
<b>TOTAL</b>		<b>19</b>	<b>81196</b>	<b>6752</b>	<b>97</b>

To reduce new infections & as a part of the initiatives, NACO envisaged reaching the migrants both formal and informal workforce linked with industries through the Employer Led Model (ELM).

### Transit Intervention

An attempt has made to reach the migrants at transit point to ensure reinforcement of awareness on risk and vulnerability reduction. The intervention is through our existing eleven TI partners in 10 districts of the state.



Fig : 7 Transit intervention Berhampur



This intervention is rolled out in corridors where there is high volume of movement of the migrants to high risk destinations. TI NGOs have been

Table :7 Transit Intervention in state

Transit Intervention in Railway Stations		
Sl. No.	Name of TI	Rly station
1	Lepra Society, Bhubaneswar	Khurda Road
2	ARUNA, Berhampur	Berhampur
3	CWSD, Balasore	Balasore
4	SEWAK, Rourkela	Rourkela
5	SAI	Bolangir
6	SAI, Titilagarh	Titlagarh
7	SRUSTI, Nuapada	Khariar Road.
8	NISW	Jajpur Road
9	OMRAH, Cuttack	Cuttack
10	BSA	Kesunga
11	Ekta, Koraput	Koraput

Fig : 8 Transit intervention Berhampur



services. The characteristics of such transit site are; there is high volume of migration, longer stop over by migrants, easy access and availability of Key Population Groups such as FSW and MSMs, & HIV prevalence of the district etc. This intervention project has part time Out Reach Workers and volunteers (street vendors, shop keepers etc.). During the waiting period of the migrants for train and during coming back from destination the ORW and volunteers provide them HIV message, leaflets and also condoms.

Futures Group, now The Palladium Group was on board during 2014-15 as the Technical Support Unit of OSACS. TSU provides technical support for the Targeted Intervention Projects, LWS and Employer Led Model (ELM) implementation in the state. During 2016-17 there are 9 Program Officers, placed at different regions for monitoring and supervision along with provision of hand-holding support to the TI programs led by NGOs. Above all a Team Leader (TSU) manages the unit as administrative head. Along with supervision, TSU analyses the SIMS data, 31 indicators received from the TI projects. TSU is also involved in site validation and internal evaluation periodically.

Table 8: PO wise supervision 2016-17

Sl No	Program Officer	TIs/ LWS/ OSTs for supporting supervision
1	PO1	12 + 0 + 2
2	PO2	5 + 4 + 0
3	PO3	10 + 1 + 1
4	PO4	9 + 1 + 1
5	PO5	9 + 0 + 0
6	PO6	8 + 0 + 0

District wise TI list and target population (FY 2016 – 17)

District	Sl No	Name of the TI Project	Category	Target Population	Tested for HIV	Tested for RPR	Condom Demand	Condom Distributed
Angul	1	The MEDICS	FSW	300	574	570	118103	112026
Balasore	2	CWSD	FSW	500	1000	973	139892	101583
Balasore	3	PVO	Core Composite (CC)	450	844	670	132293	146542
Baragarh	4	RYS	IDU	350	675	531	15212	12648
Bhadrakh	5	FELLOWSHIP	(CC)	650	1152	751	197632	85120
Bhadrakh	6	NUHAS	(CC)	400	879	808	82785	72894
Bolangir	7	SAI	(CC)	700	1203	1211	91484	85186
Cuttack	8	OMRAH	IDU	350	767	749	15317	19109
Cuttack	9	SRUSTI	(CC)	400	822	822	110201	3628
Deogarh	10	BikalpaBikash	(CC)	250	371	348	32951	30742
Dhenkanal	11	AIRA	(CC)	350	798	797	125652	117702
Gajpati	12	SWWS	(CC)	450	724	712	122380	113992
Ganjam	13	ARUNA	(CC)	500	804	804	78478	78508
Jagatsinghpur	15	IRDMS	(CC)	400	775	745	172872	96646
Jajpur	16	NISW	(CC)	800	1577	1583	253634	155325
Kalahandi	17	BSA	(CC)	500	957	900	95693	47896
Kalahandi	18	DAPTA	MSM	300	529	520	51553	55838
Kandhamal	19	SWATI	FSW	350	711	605	124176	93079
Kendrapara	20	VARRAT	FSW	400	676	677	110628	117941
Keonjhar	21	THE MEDICS	(CC)	500	571	538	157560	123998
Keonjhar	22	Natures Club	(CC)	450	857	859	130316	127131
Khordha	23	Lepra Society IDU		350	1288	1356	65346	42873
Khordha	24	VJSS	IDU	250	545	546	7393	9392
Khordha	25	VJSS	MSM	350	735	735	117521	108598
Khordha	26	OPUS	(CC)	410	1030	1099	155805	131878
Koraput	27	Lepra Society	FSW	400	852	848	113630	104724
Koraput	28	EKTA	FSW	350	712	554	87562	65214
Malkangiri,	29	Paribartan	FSW	300	427	422	70147	71306
Mayurbhanj	30	RRDC	(CC)	600	1064	1261	224085	163037
Mayurbhanj	31	CWSD	FSW	400	631	603	43205	59665
Nayagarh	32	GUC	(CC)	450	819	819	110428	76492
Nuapara	33	SRUSTI	FSW	300	541	452	57167	68086
Puri	34	PENCODE	(CC)	400	637	637	159898	112775
Sambalpur	35	IRDMS	IDU	300	619	619	22634	23571
Sambalpur	36	AIRA	(CC)	500	632	629	125006	99147
Sundergarh	37	SEWAK	(CC)	500	764	678	132276	137360
Khurda	38	Gramutthan	FSW	350	755	755	130460	135686
Khurda	39	SAKHA	TG/ Hija	250	476	482	96486	102340
Nuapada	40	SAI	(CC)	350	149	85	80286	49549
Puri	41	Hope	IDU	200	233	233	13910	16961
Puri	42	Mother	FSW	250	465	447	28147	29847
Raygara	43	SRUSTI	FSW	500	371	371	26266	27856
Angul	44	SARC	Migrant	12000	3749	1219		
Angul	45	USS	Migrant	10000	2902	887		
Dhenkanal	46	AABAHANA	Migrant	10000	3452	357		
Jagatsinghpur	47	CASD	Migrant	10000	2539	411		
Jajpur	48	NISW	Migrant	10000	3671	84		
Jharsuguda	49	AVA	Migrant	10000	523	0		
Sambalpur	50	GVS	Migrant	10000	1718	924		
Sundergarh	51	MADANI	Migrant	10000	1956	767		
Sundergarh	52	VARRSA	Migrant	10000	1399	44		
Sundergarh	53	AVA	Trucker	5000	328	0		
Cuttack	54	SAI	Trucker	5000	844	627		

### Integrated Counselling and Testing Centre (ICTC)

Integrated Counseling and testing Centers (ICTCs) are the gateway of all the services of NACP. ICTC services are available at Medical colleges, District Headquarter Hospitals, Sub divisional Head Quarter Hospitals, Community Health Centers and Block Primary Health Centers. In the ICTC a package of integrated HIV related services are provided which includes counseling, HIV testing, Prevention of Parents to Child Transmission (PPTCT), Post Exposure Prophylaxis (PEP), referral and linkage with other service providing facilities. In the ICTC, Clients are counseled and after risk assessment they are tested for

**Table 9: ICTC in Odisha state 2016-17**

Type of Facilities	2015-16	2016-17
Stand Alone ICTC	232	232
Facility Integrated ICTC	203	203
PPP Mode ICTC	17	22
Mobile ICTC	1	0

HIV after signature of a written consent. If (s) he has been referred from the Targeted Intervention Projects or

Designated STI RTI Centers (DSRC) or having symptoms of STI RTI they undergo HIV and RPR testing in a single prick. Those who are detected HIV positive they are referred to the ART centers for pre-ART registration and if with STI symptoms, they are counseled and referred to STD clinics

and those with suspected TB symptoms, referred to the Designated Microscopic Centers (DMCs) under RNTCP. In addition, all clients accessing services from the ICTCs are counseled for prevention and clients with high risk behavior are undergone counseling for risk reduction. Linkages between PPTCT, PLHA network and RCH services are envisaged to improve the HIV related services. Link Workers in high prevalent districts also strengthen the ICTC coverage by outreach activities.



**Fig : 9 Counseling at ICTC**

Table: 10 Training of counselors and Laboratory Technicians 2015-16:

Topic of Training	Participants	Number of Participants	Batches	Support
HIV-TB	STS/ STLS/DOTS Plus Supervisor	238	4	OSACS
Multi Drug Regimen Therapy Training for PPTCT	MO from 15 districts	566	30	UNICEF
Multi Drug Regimen Therapy Training for PPTCT	ANM, Staff Nurse	1495	57	UNICEF
Whole Blood Finger Prick	RNTCP LT	19	1	
	Staff nurse from labour room	62	2	
PPTCT and EID	MO	127	3	NHM
Hands on Trg. On EID	Counselor	142	5	UNICEF
Hands on Trg. On EID	lab tech	107	4	OSACS & UNICEF
Orientation -cum review on PPTCT	DDM, DPM & ICTC Counsellor	91	2	UNICEF

Figure 10: Number of standalone ICTC and clients tested for HIV Odisha, 2007-2016

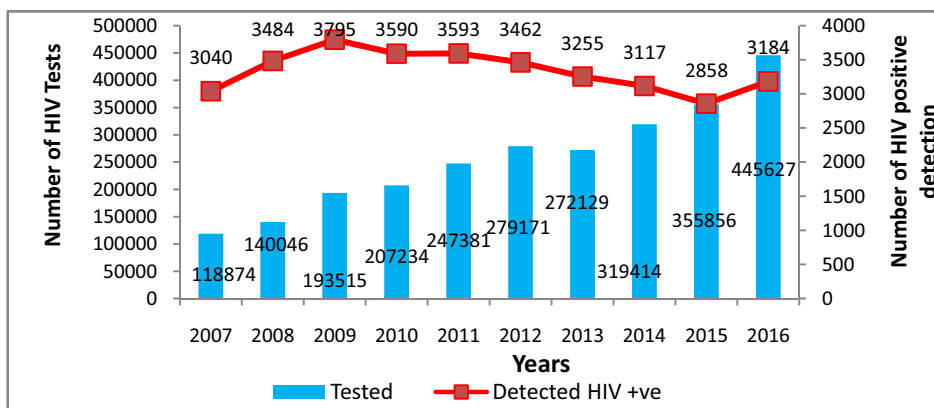
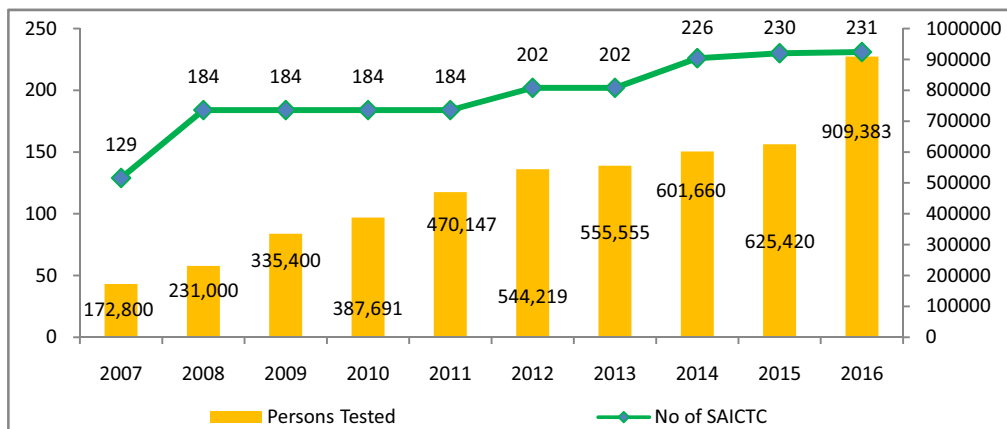
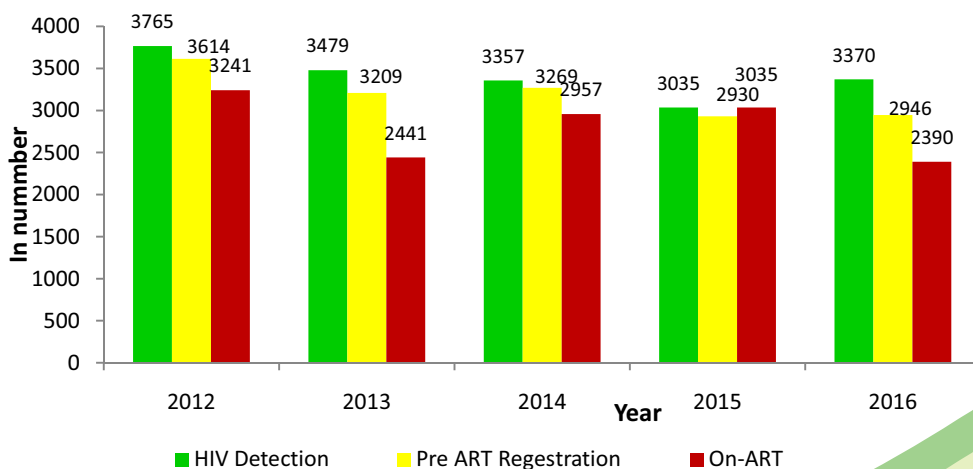


Figure 11: HIV positive detection (Excluding Pregnant Women) Odisha 2007-2016

Figure 12: HIV test positive detection vrs Pre ART registration 2012 to 2016



HIV-TB:

TB is commonest the opportunistic infection (OI) in HIV-infected individuals & HIV infection is an important risk factor for acquiring TB infection and its

progression to active TB. HIV and TB together have extremely high death rate (15 to 18%) reported among HIV-infected TB cases notified under Revised National TB Control Programme (RNTCP). Overall, TB is estimated to

cause about 25% of all deaths among PLHIV in India. Early detection of HIV/TB cases and prompt provision of Anti-Retroviral Treatment (ART) and Anti-TB Treatment (ATT) are important interventions to reduce the high mortality rate.

### **TB/HIV Coordination to reduce mortality:**

#### A. Prevention

1. Isoniazid Prevention Treatment
2. Air Borne Infection Control
3. Awareness generation

#### B. Prompt Treatment of HIV/TB

1. Early initiation of ART
2. Prompt initiation of TB Treatment

#### C. Early Detection of TB/HIV

1. 100% coverage of PITC in TB patients
2. PITC in presumptive TB cases
3. Rapid diagnosis for detection of TB and Drug Resistant TB among PLHIV
4. ICF activities at all HIV settings: ICTC, ART, LAC, TI settings

#### D. Management of special TB/HIV Cases

1. TB/HIV patients on PI based ARV
2. TB/HIV in children
3. TB/HIV pregnant women
4. Drug resistant TB/HIV

### **Activities to reduce burden of HIV among TB patients:**

- Provider initiated HIV testing and counselling (PITC) among TB patients
- Provision of co-trimoxazole preventive therapy (CPT) for HIV infected TB patients
- Provision of Anti-Retroviral Therapy (ART) for HIV infected TB patients
- Provision of HIV prevention education for patients with

presumptive or diagnosed TB cases

### **Activities to reduce burden of TB among HIV infected individuals:**

- Intensified (TB) case finding (ICF) at ICTC
- Intensified (TB) case finding (ICF) at ART centres and Link ART centres
- Air borne infection control measures for prevention of TB transmission at HIV care settings
- Implementation of Isoniazid preventive treatment (IPT) for all PLHIV (On ART + Pre-ART)

### **Review and coordination committee meetings:**

In the state level there are State level Coordination Committee (SCC) meeting under chairmanship of Secretary Health and Family welfare and officials from OSACS and TB attend the meeting and organised on quarterly basis. Two SCC meetings were conducted twice during 2016-17 and policy decisions were taken in this meeting. In the district level, District Coordination Committee meeting is conducted in each quarter under the chairmanship of Dist Collector cum Magistrate and monthly HIV TB coordination committee meeting under chairmanship of ADMO (PH) or DTO each month. STS, STLS, Counsellors from ICTC and counsellors from ART center attend the meeting and the referrals; detections of both TB or HIV, HIV-TB co infections, referrals from ART center and the result and treatment status are discussed in this meeting. The shortfalls in the results are fulfilled and the individual reports are complied. The minutes of the meetings are forwarded to OSACS in proper formats.



Table 11 : The monthly and quarterly District Coordination meeting status

Monthly & Quarterly DCC meeting status of Districts (2016-17)							
Sl. No	District name	Monthl y (12)	Quarterly (4)	Sl. No	District name	Monthl y (12)	Quarterly (4)
1	Angul	12	4	16	Kandhamal	11	4
2	Bolangir	11	3	17	Kendrapara	8	3
3	Baleswar	12	2	18	Keonjhar	8	2
4	Baragarh	8	4	19	Khurda	11	2
5	Boudh	9	1	20	Koraput	10	3
6	Bhadrak	11	3	21	Malkangiri	4	1
7	Cuttack	10	1	22	Mayurbhanj	2	1
8	Deogarh	9	1	23	Nawarangpur	2	3
9	Dhenkanal	12	2	24	Nayagarh	9	3
10	Gajapati	12	1	25	Nuapada	9	0
11	Ganjam	12	2	26	Puri	11	4
12	Jagatsinghpur	12	3	27	Rayagada	6	0
13	Jajpur	10	2	28	Sambalpur	8	1
14	Jharsuguda	11	3	29	Sonepur	3	2
15	Kalahandi	1	1	30	Sundergarh	10	1

Fig: 13 Referral from ICTC vrs TB detection Odisha 2008 to 2016

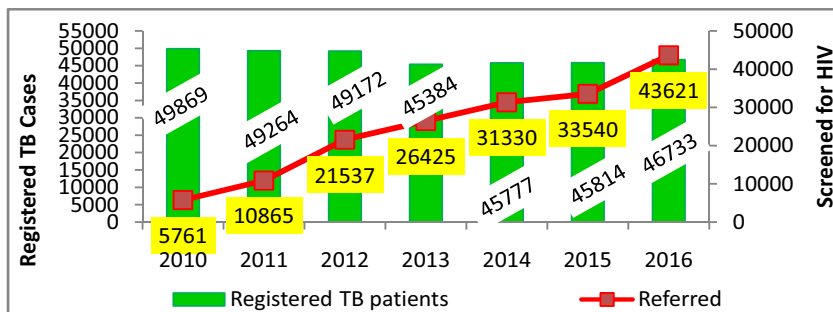
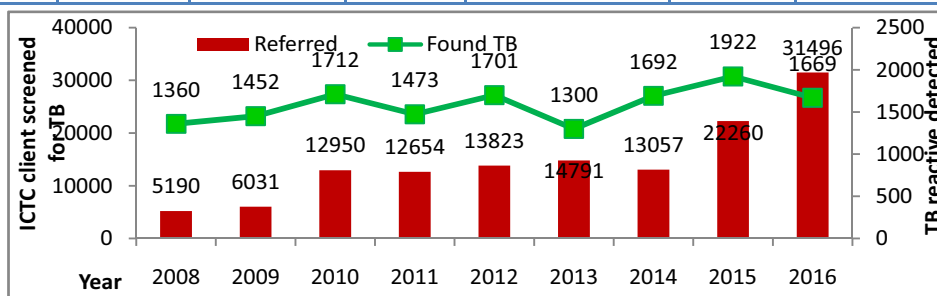


Fig: 14: Registered TB cases vrs referral to ICTC 2010 to 2016

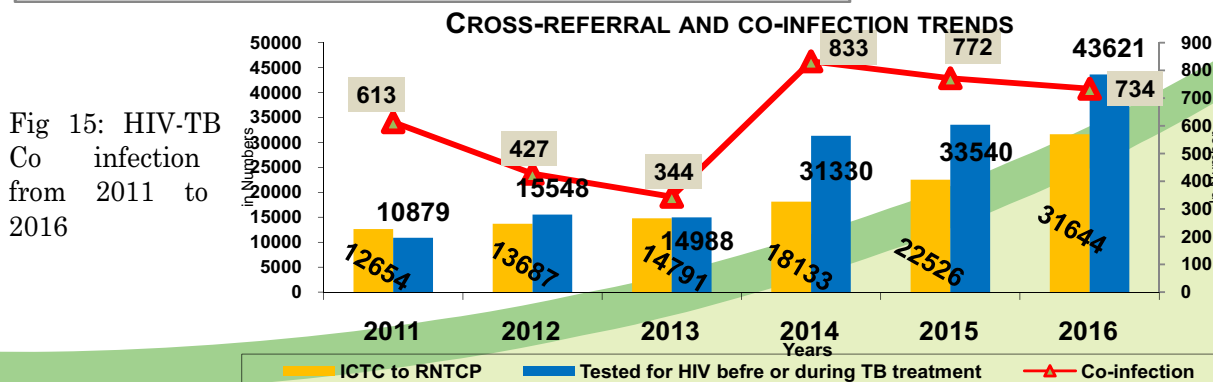


Fig 15: HIV-TB Co infection from 2011 to 2016

Table 12: HIV-TB Cross Referral

Indicator	Achievement
Referral for general client from ICTC	31644 (8%)
Sputum + ve TB	782
Sputum Negative TB	534
Extra Pulmonary TB	109
Found TB positive	1796
Total TB Cases registered	46733
Tested for HIV before or during TB Treatment	43621 (93%)
Out of that HIV+ve	613 (1.4%)
<b>Total Cross Referral</b>	<b>75265</b>
<b>Total Co-infected cases</b>	<b>734</b>

Figure 16: Referral from ICTC to RNTCP

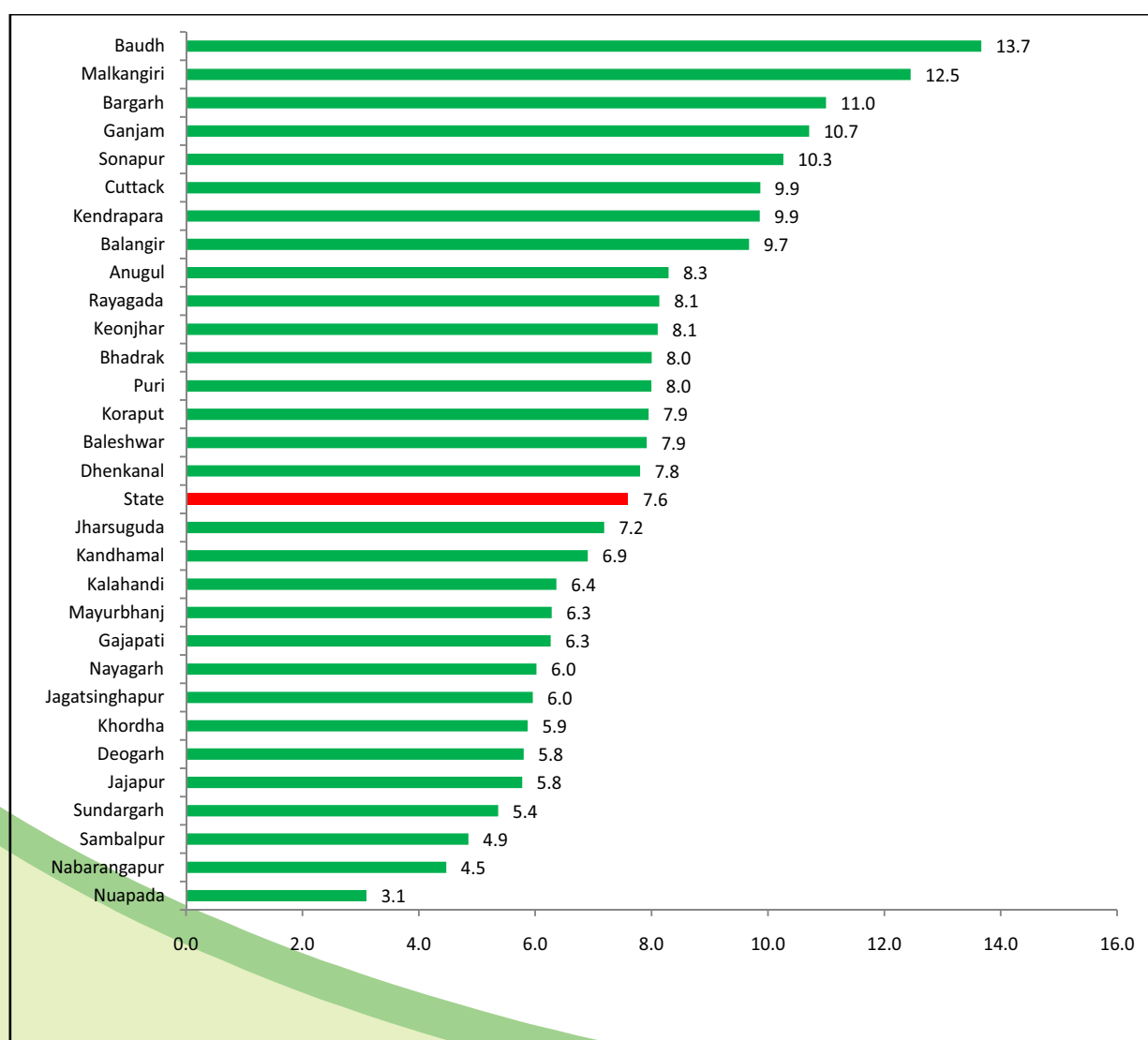
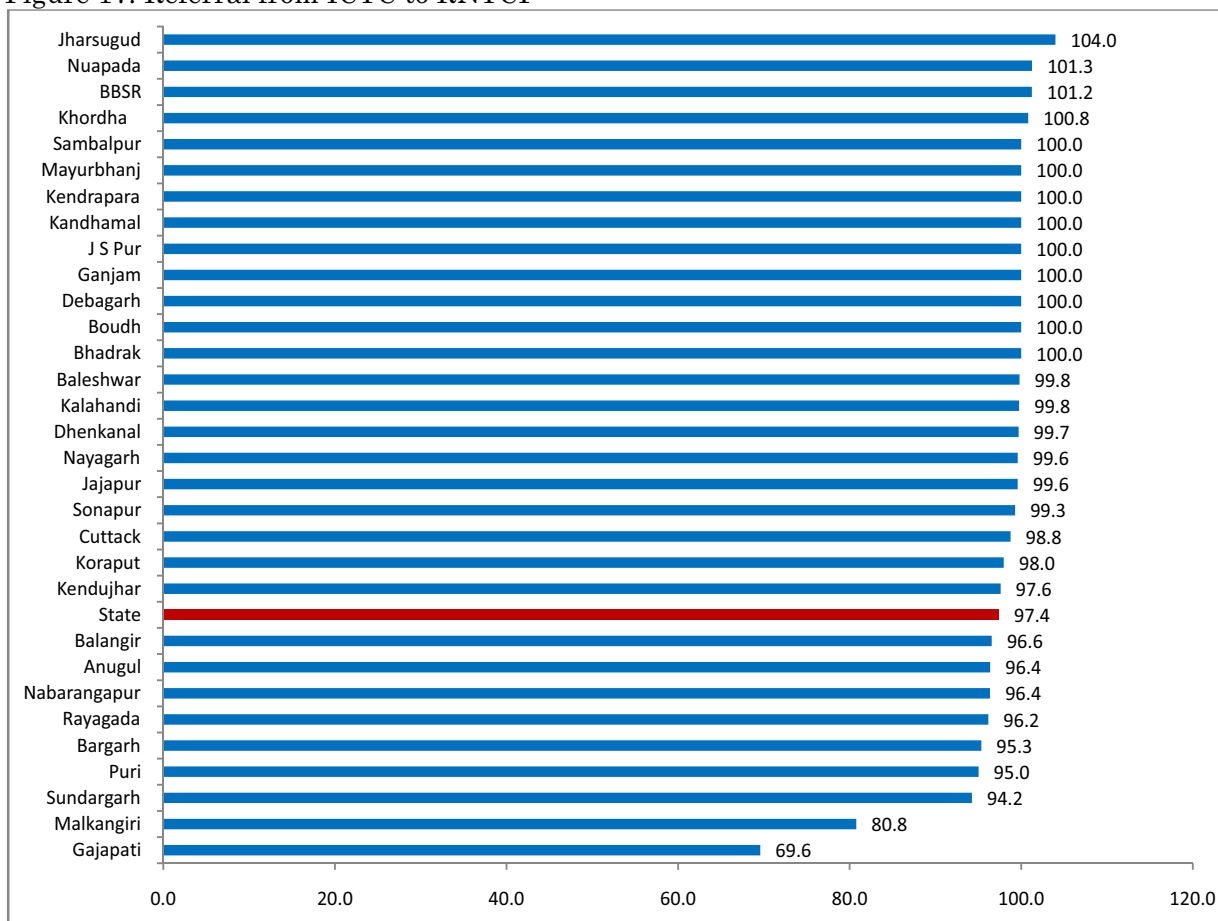


Figure 17: Referral from ICTC to RNTCP



**Prevention of Parent to Child Transmission:**

For effective implementation of the PPTCT programme, in collaboration with NHM & UNICEF, several steps have been initiated by OSACS. The prime focus is to integrate the PPTCT services in the RMNCH+A programme. Different strategies have been made & started which includes universal HIV screening, provision of all PPTCT logistic at all 580 functional delivery points with support of NHM, Capacity Building of all doctors and paramedical of functional Delivery Points, orientation of district RCH Programme officers and biannual review with UNICEF Support . All the policy level decisions are made in the NHM-OSACS Convergence Committee meetings which is being done biannually.

For provision of Early Infant Diagnosis; (EID) has been scaled up from 20 centres to 122 centres. Two other developmental partners such as SAATHI & PLAN India also joined their hands in this process. SAATHI is working to increase HIV screening in private sector in 27 districts and Plan India is working for 11 districts where ANC coverage is less than 30% with an objective to uptake of HIV screening at public sector by refereeing the ANC clients to ICTCs for HIV Screening.

Fig : 18 Collection of blood sample



Figure 19: Number of HIV test and HIV positive detection among pregnant women in Odisha state 2007 to 2016

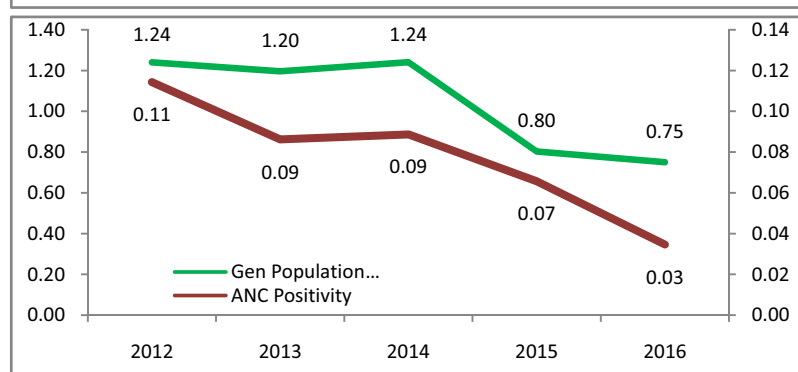
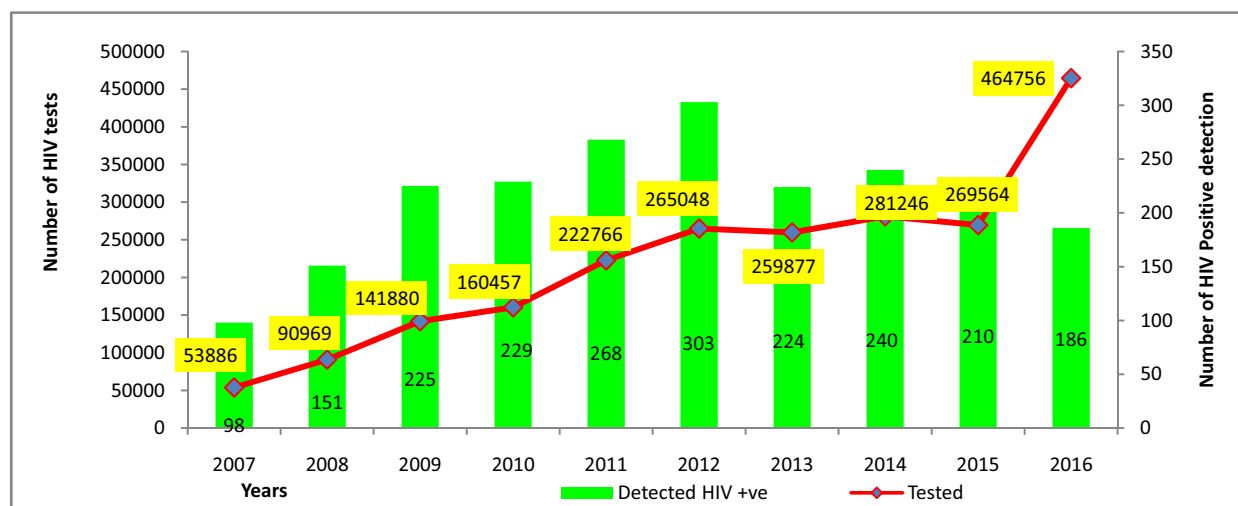


Fig: 20 HIV prevalence of general clients and pregnant women in ICTC of Odisha 2012 to 2016

As per PPTCT guideline a 4 prong strategy is being utilized in the country

- Primary prevention of HIV, especially among women of child bearing age
- Preventing unintended pregnancies among women living with HIV
- Prevent HIV transmission from pregnant women infected with HIV to their child
- Provide care, support and treatment to women living with HIV, her children and family in women in child bearing age

#### The continuum of care in PPTCT:

1. Increasing uptake of PPTCT services by pregnant women.
2. Counselling and Testing and detection of HIV infected pregnant women.

3. Linking HIV infected pregnant women to Care, Support and Treatment services.
4. Initiating ART for all HIV infected pregnant women regardless of CD4 count, starting it as soon as diagnosed and continued for life.
5. Counselling on birth-planning and institutional deliveries of HIV infected pregnant women.
6. Screening emergency labour room deliveries (un-booked cases) for HIV. If HIV positive, providing ART and obtaining sample for CD4 cell count as soon as possible.
7. Provision of Syrup Nevirapine for the new born infant from birth till 6 weeks of age (minimum). At the end of 6 weeks, CPT should

be initiated and baby to be linked to the EID programme.

8. If the infant is detected positive in EID (DBS+WBS tests are positive), then initiation of Pediatric ART.

Table: 13 HIV detection and ART status; children of HIV positive mother beyond 18 months of age 2016-17

Number of children of HIV positive mother beyond 18 months of age who came for follow up	Number of children of HIV positive mother beyond 18 months of age who were tested (antibody test).	Number of children of HIV positive mother beyond 18 months of age who diagnosed HIV infected	Number of children of HIV positive mother beyond 18 months of age registered at ART Centre
165	144	14	13

Table 14: Pregnant women under care and support 2016-17

Pregnant women/DIL/Breastfeeding women registered or reported in the current financial year			Number of pregnant women/DIL/Breastfeeding women initiated on ART	
Newly Registered Women	Already Registered Pre-ART	Already Registered On-ART	Newly Registered Women	Already Registered Pre-ART
185	35	70	184	35
Number of children/infants registered at the ART center through EID during current financial year			Number of children/ infants initiated on ART	
Children	Children		Children	Children
Males	Females		Males	Females
6	3		5	2

Table 15: Infants /children tested for HIV and found positive using DBS-DNA PCR 2016-17

Number of infants/children tested for HIV using DBS-DNA PCR				
First Visit		Second Visit		Third Visit
6 weeks-6 months	6-18 months	6-12 months	12-18 months	12-18 months
158	46	29	5	1
Number of infants/children HIV positive by DBS-DNA PCR				
3	0	0	1	8

9. Follow-up of HIV infected mother and baby until breastfeeding period is over.
10. At six weeks of age of baby, do DBS and confirm with WBS test.
11. Confirmation of diagnosis of child using 3 anti-body tests (Rapid) at ICTCs at 18 months of age

Table: 16 Number of infants on co-trimoxazole prophylaxis 2016-17

Number of Infants on Co-trimoxazole			
First visit		Second visit	
6 weeks-6 months	6 months-18 months	6 months-12 months	12 months-18 months
107	42	10	28



Fig : 21 Review & training on PPTCT

### AHANA- PPTCT initiative in public sector.

To improve access to PPTCT services in Govt. Health facilities HLFPP in partnership with Odisha State AIDS Control Society started AHANA programme in 11 districts of Odisha, supported by Plan International India. The objective of the project was skill building among health workers to increase the uptake of PPTCT services and to conduct outreach to enhance screening of ANC mothers and follow up of HIV Positive Women and HIV exposed infants.

In Odisha, AHANA was launched in 105 blocks of 11 districts (Puri, Cuttack, Jagatsinghpur, Jajpur, Keonjhar, Boudh, Nuapada, Kalahandi, Nabarangpur, Malkangiri & Rayagada) in coordination and support of OSACS and NHM in January 2016. The project districts were selected with reference to the low PPTCT service intake (0.27% to 29.8% - with an aggregate average of 18%) compared to national average of 42.95%) (Data source: SIMS-HMIS Apr 2014- Dec 2014).

Under AHANA, 321781 pregnant women were undergone HIV screening in different health facilities from January 2016 to October 2017 out of 542458 registrations. Out of them 84 were detected HIV positive and 80 were linked to ART services. HIV exposed babies 39 in number have been administered Early Infant Diagnosis. AHANA covered 12254 pregnant women of the left out/interior pockets by organising 242 health camps and ensured universal coverage under PPTCT.

### Project coverage

- Number of districts: 11
- Block: 105
- Gram Panchayat: 2227
- Villages: 17625
- Coverage:
  - 36% of districts (11/30 districts)
  - 33% of the blocks of the state (105 / 314 blocks)
  - Coverage of districts under "C" Category

**Training:** Under AHANA program 485 ASHA & ASHA Sathis, Block Programme Managers (BPM) in 11 districts were trained and in this program CDMO, ADMO-PH, ADMO-FW, ICTC Counsellors, Asst. Manager-ASHA, DPM-NHM from the 11 districts involved actively. There was a 2 days training for the State Resource Team organized in July 2016. In this training 30 ASHA Sathis from 11 districts participated. The trained ASHA Sathis supported to enhance the capacity of 550 volunteers and 955 ASHAs in those districts. These trainings resulted in increased referrals and services linkages of ANC mothers for PPTCT services in respective districts. 1055 ANMs of the selected sub-centres were trained on Whole Blood Finger Prick Test (WBFPT) and PPTCT to initiate VHND level screening which will be started after approval from Govt. of Odisha.

**Advocacy meetings:** 217 advocacy meetings were conducted both at district and block level and 6138 officials/project staff participated in the meetings till September 2016. The issues like HIV screening at delivery points, training of staff nurse on WBFPT, supply and use of WBFPT kits, reporting in FICTCs and referral of ANC cases from private to public health facilities, organization of health camps etc. were discussed in the advocacy meetings to get support from them.



**Community mobilization meetings:** The AHANA Project team conducted 666 numbers of community mobilization meetings with frontline peripheral workers, PRI, SHG, GKS leaders in 11 districts of Odisha till June 2016. 16278 community members inclusive of health providers participated in the meeting.

**PLHIV network meetings:** 124 numbers of PLHIV network meetings were organized and 2237 people participated in the meeting. Enhancement of HIV screening and effective linkage to care and support services was discussed in the meeting.

**Mid Media activity:** AHANA mobilised the community through 190 Street plays and 465 Wall Paintings in project districts with the inclusion of national and state PPTCT helpline numbers.



Fig: 24 Street play on PPTCT & Training of ASHA on PPTCT



Fig: 22 ANM Training on PPTCT under AHANA



Fig: 25 Wall Painting in CHC



Fig: 23 Health Camps for pregnant women

**Regional Review meeting:** Regional Review meetings were conducted in three Regions of Odisha. In the meetings ADMO (PH), DTO, Medical officer in charge of ICTC, counsellors, laboratory technicians of ICTC, TI NGO staffs (PM, Counsellors), ART center staffs (SMO, Counsellor, M&E), STS, STLS from all the districts attend the meeting in the presence of District Collector or his representative, Project Director OSACS, CDMO of the district. In Kalahandi District Collector and in Sundergarh ADM attended the meeting. Regional Review meeting for Sambalpur and Baragarh was held on 15.12.16, for Sundergarh and Jharsuguda in Sundergarh on 16.12.16 and in Kalahandi for districts of Kandhamal, Boudh and Kalahandi on 10.2.17 were organised.

## Number of Counselors and Laboratory Technicians in the ICTC

SINo	District	No of ICTC	Counsellors		Lab Technicians	
			In Place	Vacancy	In Place	Vacancy
1	Anugul	9	8	1	4	5
2	Balangir	15	10	5	3	12
3	Baleshwar	12	11	1	4	8
4	Bargarh	6	6	0	1	5
5	Baudh	3	3	0	1	2
6	Bhadrak	8	8	0	4	4
7	Cuttack	12	12	0	8	4
8	Debagarh	3	2	1	0	3
9	Dhenkanal	6	6	0	4	2
10	Gajapati	3	2	1	1	2
11	Ganjam	28	25	5	15	13
12	Jagatsinghapur	5	5	0	3	2
13	Jajapur	8	8	0	3	5
14	Jharsuguda	4	4	0	2	2
15	Kalahandi	7	5	2	1	6
16	Kandhamal	3	2	1	2	1
17	Kendrapara	5	4	1	4	1
18	Kendujhar	8	7	1	0	8
19	Khordha	15	16	0	13	2
20	Koraput	11	11	0	3	8
21	Malkangiri	2	1	1	1	1
22	Mayurbhanj	10	10	0	3	7
23	Nabarangapur	4	3	1	1	3
24	Nayagarh	7	7	0	3	4
25	Nuapada	5	4	1	0	5
26	Puri	5	5	0	3	2
27	Rayagada	5	5	0	2	3
28	Sambalpur	6	6	0	6	0
29	Sonepur	5	4	1	2	3
30	Sundargarh	12	7	5	2	10
	Total	232	205	30	99	133



## Care Support and Treatment

After HIV detection in the ICTC the clients are linked to the ART centre for Pre-ART Registration. In the ART centre they are undergone registration and a white card is filled up and all the personal information, caregivers name and address, telephone number, physical findings other signs and symptoms are mentioned in the white card. CD4 count is conducted for all the People Living with HIV AIDS (PLHIV) twice a year free of cost. To ensure the CD4 testing a due list is prepared in the ART center for each month. Those who do not come to ART centre for CD4 count they are being tracked by members of Community Support Centres (CSC) VIHAN Project which are managed by PLHIV networks. All HIV+ve clients along with pregnant women are initiated with ARC drugs as per test and treat policy.

The patients on ART come to the ART centre each month for health check up, follow-up, evaluation and they collect the ARV drugs from the ART center. After consumption of the ARV drugs for 6 months and stabilisation of their health condition and if they do not have opportunistic infections; they are linked to the Link ART centres and they collect ARV drugs each month and attend the nodal ART centre every 6 months for CD4 count, other blood tests, health check up and follow-up.

Apart from treatment the ART and Link ART centres refer the TB suspected cases to Designated Microscopic Centers (DMC) for sputum test and given daily ATT coordinate the Early Infant Diagnosis (EID) under PPTCT program. The spouse of PLHIV if negative for HIV

or not tested for HIV they are tested for HIV at ART center.

Co-trimoxazole is given to all the registered PLHIV if CD4 count <250 or stage III or stage IV illness. Co-trimoxazole tablets are available in all the ART Centers. For children Co-trimoxazole syrup and paediatric tablets are available in the ART Centers.

**Alternate first line treatment:** If patient cannot tolerate any one component of first line drug alternate first line drug combination is started. It is decided by Medical Officer in the ART center and if required by Sate AIDS Clinical Expert Panel (SACEP) which is functional in the SCB Medical College Cuttack. It is a panel of Professors from Medicine, O&G, Skin VD, TB Chest, Paediatrics, OSACS representation Senior Medical Officer ART center and nodal Officer ART and it is twice a month.

**Second line ART:** If a patient fails to first line drug clinically or immunologically are referred to Sate AIDS Clinical Expert Panel (SACEP) for evaluation. If SACEP decides send for targeted viral load testing. If viral load is >1000 copies/ml of blood 2<sup>nd</sup> line drug is advised by SACEP and started in his own ART center. 2<sup>nd</sup> line drugs are available in all ART centers. 101 adult males, 25 females, 2 male children and 1 female child have been referred to SACEP and 71 adult male, 23 adult female 1 male and 1 female child were reviewed by SACEP. 21 Male and 4 females were eligible for Second line ART. Till the end of March 2017, the cumulative number of patients on second line ART treatment is 118; out of which male 90, female 20, male children 6 and 2 female children.

Criteria for Second line ART:

1. Any clinical failure
  - a. No clinical improvement after 6 months of treatment
2. Immunological failure
  - a. CD4 count less than baseline CD4 count
  - b. CD4 count less than 50% of highest detection during treatment
  - c. CD4 count continuously less than 100 in last 3 occasions
3. Virological failure
  - a. Viral load more than 1000 copies per ml of blood.

**Third line ART:** Third line ARV is now available and dispensed to patients failing to second line ART.

**Anti TB Treatment for HIV-TB co-infected Patients:** Daily Anti TB treatment (Daily ATT) is provided by the ART centers to HIV-TB co-infected cases. These co-infected cases are followed up by 99 DOTS.

**Annexure 1: Facilities in the state**

Figure 26: Year wise HIV+ve detection vrs Pre-ART Registration and started ART

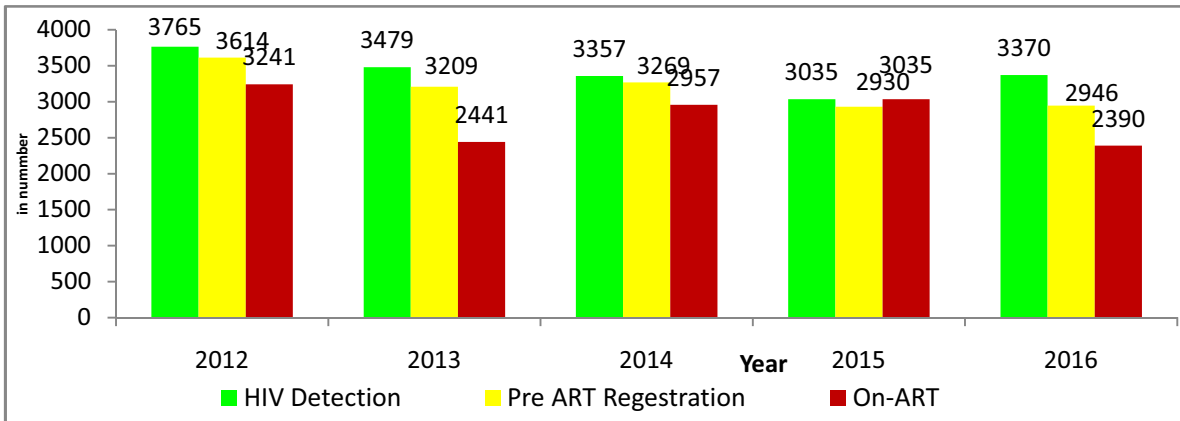


Figure 27: Cumulative Pre ART Registration vrs On-ART, Odisha (2009- 2016)

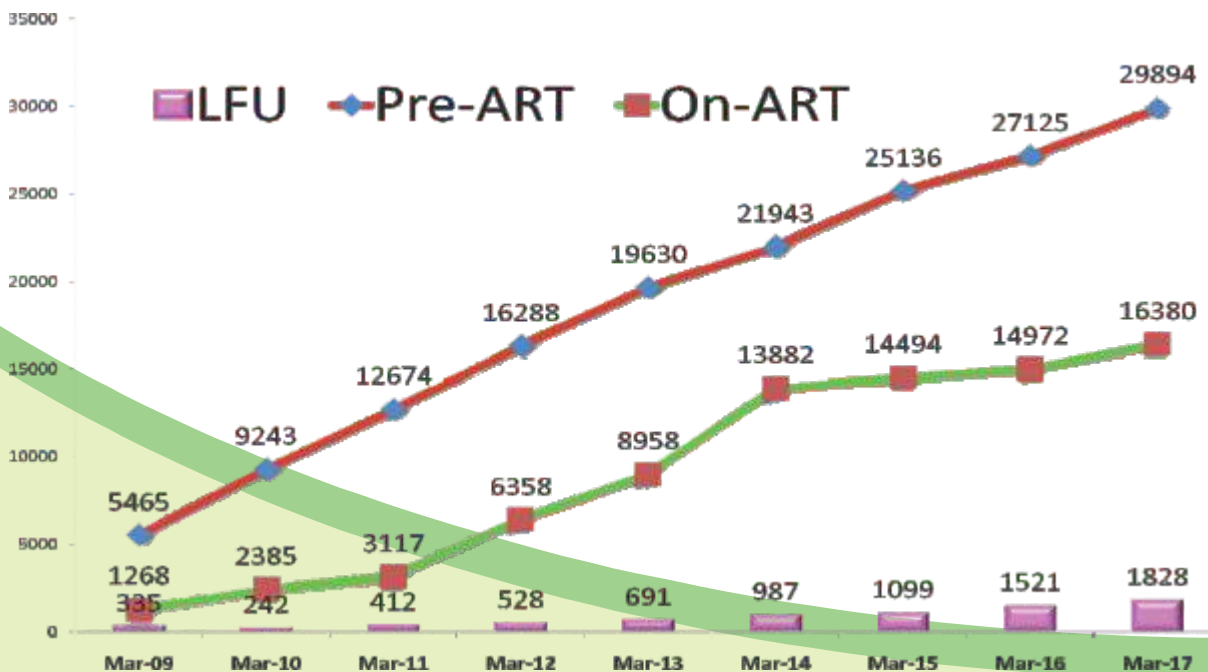


Table 17: Anti Retroviral therapy for HRG and Bridge population:

HRG, Bridge population	Registration ART centers	Initiated ART during 2016-17	Cumulative Reg. till March 2017	Alive and on ART
FSW	14	11	55	32
MSM	65	45	437	217
IDU	22	12	300	90
TG	32	21	267	103
Migrant	383	333	2377	912
Truckers	87	62	355	211

Table 18: Number of co infected cases registered in the ART centers

Total number of Co-infected patients enrolled in HIV/TB register					
Male	Female	TS/TG	Children		Total
			Male	Female	
525	183	4	21	13	746
TB diagnosed among PLHIV in the ART center					
226	70	2	9	5	312
Total number of Co-infected patients initiated TB treatment					
496	173	4	20	12	705
Total number of Co-infected patients initiated CPT					
507	170	3	19	13	712

Table 19: Number of Drug resistant TB cases diagnosed from ART centers 2016-17

Number of TB patients with DR TB (Drug Resistant TB) initiated on Cat IV treatment					
Male	Female	TS/TG	Children		Total
			Male	Female	
2	1	0	0	0	3
Rifampicin resistance					
1	0	0	0	0	1

**Supervision and Monitoring:**

In the district level there is a monthly review coordination committee meeting is held under chairmanship of the nodal officer and review cum orientation meetings are held in the state level

under chairmanship of the Project Director.

**Care Support Centers:**

**VIHAAN:** Vihaan Care and Support program is a national initiative to provide expanded care and support services for people living with HIV. The

program is designed to enhance access to essential services, support treatment adherence, reduce stigma and discrimination and improve the quality of life of PLHIV. VIHAAN project is supported by GFATM, Round-4, RCC-II. Lepra Society acts as the Sub-recipient of the programme and the Principal Recipient (PR) is India HIV / AIDS Alliance. Project covers 21 out of 30 districts of Odisha through 9 Care and Support Centres and one Help Desk located in 10 districts. The overall goal of the programme is to improve the survival and quality of life of people living with HIV (PLHIV). As on date, out of 42,886 PLHIVs in the state, a total of 16,433 PLHIVs are registered in the VIHAAN. The programme is being implemented in partnership with eight PLHIV networks and two NGOs.

#### Objectives of the programme:

1. Early linkages to care support & treatment services: Supporting the newly-identified PLHIV to enrol in the national ART programme.
2. Improve treatment adherence and education: Helping the PLHIVs to sustain and manage their treatment regimen.
3. Increase early testing and expanded positive prevention activities: Contributing to national efforts to prevent HIV transmission and reduce overall burden of disease.
4. Improve social protection and wellbeing of PLHIV: Facilitating access to existing social welfare and protection schemes.
5. Strengthen community systems and reduce stigma & discrimination: Building skills of community members to advocate for access to stigma and discrimination-free services.

**Table : 20 Achievement of during past one year (Apr 2016 – Mar 2017)**

Activities	Achievement
No of PLHIVs registered in ART Centre and on ART are registered in the CSC/HD	1159; 8328(Cumulative)
No of PLHIV in Pre ART phase who get registered at the CSC/HD	1323; 5695 (Cumulative)
No of registered PLHIVs receiving at least one counselling service in the quarter (By the Peer Counsellor)	2343
No of registered PLHIVs receiving at least one counselling session on thematic areas	2301
No of PLHIV whose at least one family member or sexual partner referred for HIV testing and received test result	554
No of PLHIV registered in the CSC/HD linked to Govt. social welfare scheme	1373
Proportion of PLHIV lost to follow up (LFU) brought back to treatment	3828
No.of HIV positive patients who were screened for TB in HIV care or treatment setting	8547
No of Advocacy meeting organised	28



Fig: 28 State level ART Review meeting & ART Coordination committee meeting



Fig: 29 Laboratory technician testing blood for CD4 count ART Center MKCG Medical College, Berhampur.

## IEC

Information Education and Communication (IEC) is a process of working with individuals, communities and societies to develop communication strategies to promote positive behaviors which are appropriate to their settings. Communication is a cross cutting and integral strategic intervention in all components of HIV/AIDS prevention, care, support and treatment programmes under the National AIDS Control Programme. The ultimate goal of IEC component is to create an enabling environment that encourages HIV related prevention, care and support activities, and to reduce stigma and discrimination at individual, family, community and institutional levels. Orissa State AIDS Control Society (OSACS) conducted a number of activities during 2016-17. The media used were electronic, print, mid media, outdoor media. With an aim to instigate behaviour change among people, OSACS implemented the awareness campaign through mid-media, which covered all the 30 districts of the state. OSACS covered 19 districts and in collaboration with AHANA project other 11 districts were covered. Red Ribbon Clubs were largely mobilised during the International Youth Day.

IEC strategy focused on:

- Promoting behavioural approach that prevents transmission of STD/HIV/AIDS
- Fostering attitude and behavior that will prevent discrimination against those who are infected with STD/HIV/AIDS and promoting solidarity among PLHIV



- Care Support & Treatment facilities provided to the people affected and infected with HIV.

IEC program not only produces and disseminates materials; it is to distil and articulate the information in hand into messages that are more attractive, accurate and complete so as to promote awareness and lead to proactive sensitization that will usher in some change in health seeking behavior” and to avail facilities provided for Care, Support & Treatment. As such there is no effective medium to reach the community as a whole. It can be realized only through synchronizing the positive aspects of various media simultaneously.

#### Activities undertaken

##### A. Mass media

- I. Under Mass Media through Doordarshan, against a stipulated target of three Live Phone-in and 4 nos. of panel discussion, one Live Phone-in and four panel discussions were telecasted during Special Events and specific Campaigns.
- II. Through All India Radio, out of 200 audio spots comprising of 30 seconds duration, only 92 spots were broadcasted during regional news at evening (state hook up) i.e, 2 spots daily for a period of 46 days.
- III. 22 numbers of Print Advertisements were released in periodicals, local and English dailies, during special events and Campaigns.

##### B. IEC material printing and replication

- I. Development & Printing of Aagaku Pada Badhantu (Migrant Transit Book), Suchana ra Gantaghara (Migrant Transit Book), Jiban Thile Sabu Kichhi (Migrant Transit Book),

Migration Transit Kit (Booklet), Posters (15 types 2000 each multicolor), Leaflet for Service Delivery units of OSACS (Black & White), Booklet on PPTCT, Leaflet on ART Adherence, Basic Services, TB-HIV, on Red Ribbon Club (100000 each), Printing of leaflet on basics of HIV/AIDS, Stigma & Discrimination, Booklet on Know AIDS for No AIDS (Odia-60,000 Hindi-30,000 and English 10,000), Booklet on Social Security Scheme, Printing of HIV/AIDS messages in Computerised tickets of OSRTC buses and 1000 copies of Newsletter were printed.

##### C. Outdoor and mid-media

- I. Outdoor Media: Message on Prevention from Parent to Child Transmission (PPTCT) and migration were carried out in 92 numbers of Odisha State Road Transport Corporation (OSRTC) buses moving to far districts and migrating districts mostly in rural areas.
- II. HIV/AIDS awareness message was disseminated in rural areas through 624 nos. of traditional folk performances
- III. IEC stalls were installed in the world famous car festival of Puri and in Adivasi Mela, Bhubaneswar and disseminated awareness messages through distributing the IEC materials and quiz programmes.

##### D. Convergence with NHM

- I. In convergence with NHM the message on PPTCT and HIV-TB co-infection was incorporated in the IEC materials and other IEC programmes of NHM. During Rath Yatra HIV/AIDS awareness messages were also displayed in Puri by NHM.

### E. Special events

Three special Events namely National Voluntary Blood Donation Day, World AIDS Day, and National Youth Day were commemorated at State and District Levels.

#### World AIDS Day-2016:

In the occasion of World AIDS Day around 15 thousand students formed a human chain in the shape of Red Ribbon pleading solidarity for the cause of HIV/AIDS at Bhubaneswar. The activity was being jointly organized by Orissa State AIDS Control Society (OSACS) and Kalinga Institute of Social Sciences (KISS) on 1<sup>st</sup> December 2016. The students of KISS belonging to tribal communities from various parts of Odisha aged above 14 years, took part in the event to be held at KISS Campus, Patia. Besides the state level observance the day was also observed in district level. In the evening SAKHA the TI Project for Transgenders and Hizra conducted mass rally in the morning and organized a fashion show in the evening.



Fig: 30 Fashion show organized by TG Hizra population in eve of World AIDS Day 2016

Fig: 31 Oath taking on eve of World AIDS Day 2016



**National Youth Day:** It was celebrated on 12<sup>th</sup> January in collaboration with Indian Red Cross Society (IRCS), OSB, Bhubaneswar. For the first time it was conducted for consecutive 3 days involving more than 300 students of different colleges having Red Ribbon Clubs (RRC).

#### F. Mainstreaming & youth programme

These activities were under taken by Mainstreaming division of OSACS:

#### I. State Consultation meeting on Legal Protection for PLHIV, Children Affected By AIDS & Most at risk Population :

It was to aware the PLHIV regarding the legal aid through District Level Services Authority and State Level Service Authority. The SLSA in the state level and DLSA were formed in the DAPCU districts and orientations were performed in these districts. In DLSA and SLSA one advocate is the member.



II. **PLHIV Meet:** One-day meet was conducted with PLHA network aims to educate them about aspects related to HIV/AIDS, ART Adherence, Positive living and Rights. It also entails bridging the gap between the PLHAs and Civil Society and encouraging them to live a free life.

III. **Training for water resource officials:** Trainings for Officials of Department of Water Resources was organized during June' 2016, where 26 nos. of participants were attended at state level.

IV. **Training for ASHA supervisor, ANM & AWW:** The trainings were organized in 7 nos. of DAPCU districts.

Fig 33 World AIDS Day 2016





Fig 34 Folk Troupe in Action



## Blood Safety

Blood is an essential component in health care system and its role is critical in life-saving measures. To reduce the Transfusion Transmitted Infections (TTI) that is HIV, HBV, HCV, Syphilis and Malaria through blood and blood component transfusion, major steps have been taken for screening all the collected blood units for testing as per recommended guideline and properly follow up of the rules made under Drugs and Cosmetic acts. The major objective of National AIDS Control Program (NACP) is to increase voluntary blood donation to 100% to avail adequate and apparently safe blood for the citizens through voluntary blood collection. If any of the blood units found sero positive for any of the TTI, the blood unit is discarded. These discarded blood units are destroyed by respective blood banks following the Government of India guidelines issued by Dept of Pollution and Environment Control Board. Further the same individual whose blood unit was found sero positive for any of the five mandatory tests then they are called upon as per their consent and referred to be linked to the referral centers like ICTC and general medicine wards for further conformation and treatment. Moreover Govt of Odisha has decided to set up more numbers of Blood Component Separation Units (BCSU) in phased manner at least in all district headquarter Hospitals to ensure appropriate clinical use of Blood and blood component and to save three to four lives from one blood unit.

There are 56 Government, 1 Redcross, 6 Public, 12 Private and 7 Charitable blood banks, 57 Blood storage units (BSU) are in the state of Odisha. As

blood banks come under purview of Drugs and Cosmetics act, Drug Controller Odisha is the licensing authority for all the blood banks. Among all the blood banks there are 12 major blood banks and 14 Blood component separation units (BCSU). All the blood banks are situated in the tertiary care hospitals and in 2 Community Health Centers.

Apart from that the Government of Odisha has a plan of automation technology in the field of serology that is for grouping and cross matching.

With reference to the data of last five years the trend of voluntary blood collection has been increased and sero positivity rate of the TTI among the collected blood units are below the national average.

**Blood Storage Units:** To address the RCH programme and to cater the need of blood required by pregnant women, neonates as per guideline NHM has categorised the FRUs from L3 to L1 level, so that it can be possible to address mortality due to want of blood. On the basis of prioritisation of Blood storage centres/units are made functional in these identified FRUs, if they have fulfilled all the criteria laid down in the drugs and cosmetics Act 1940 & rules – 1945.

### Blood Processing and Cold Chain:

- Blood component preparation:
  - During the year 2016 out of the blood collection in the BCSUs 32.6% blood units were undergone component separation and during the year 2015 it was 15.4%. Total number of blood collection in the

- BCSUs was 41% of the total blood collection in the state.
  - Out of the total blood collection in the state 13.2% during 2016 and during 2015 only 6.2% of the total blood collection was undergone component preparation.
- The Blood Component Separation Units (BCSU) are present in 14 blood banks and components are utilised in the same hospitals and also utilised in other hospitals. During the year 2016, 162854 components were prepared and 35.6% of the Blood components have been utilised in other hospitals besides the BCSUs.
  - Cold chain maintenance: Cold chain is maintained after collection till transfusion to the patient.
    - The blood units are transported from camp sites to Blood bank by Blood transportation vans that are fitted with refrigerators. In the other blood banks where there is no blood transportation vans blood units are carried by cold boxes.
    - During the transportation of blood units or blood components to other hospitals blood transportation van is utilised and also in cold boxes.

Figure 35: Total blood collection, voluntary blood collection and percentage of voluntary Blood collection 2007-16

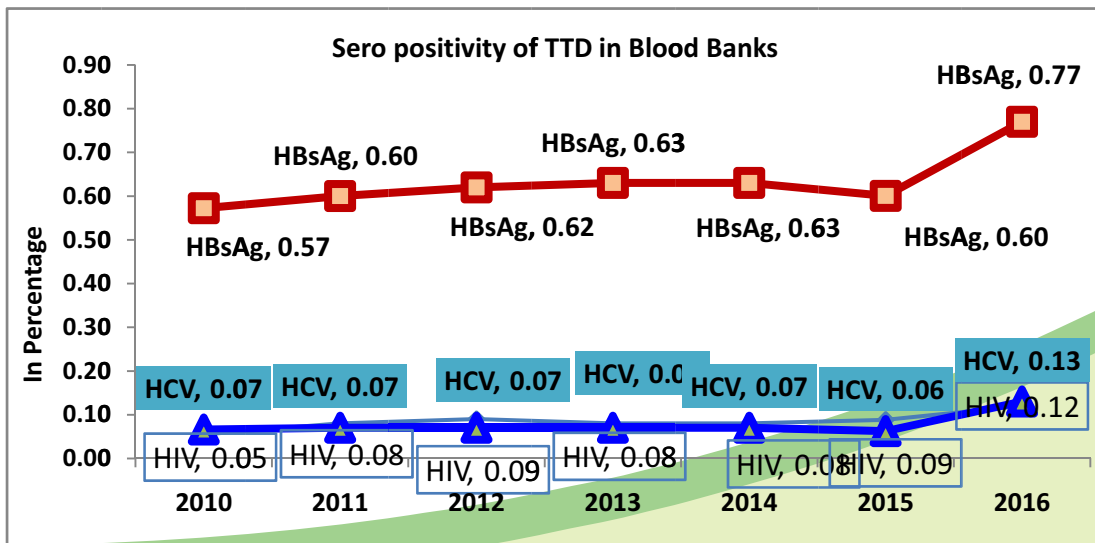
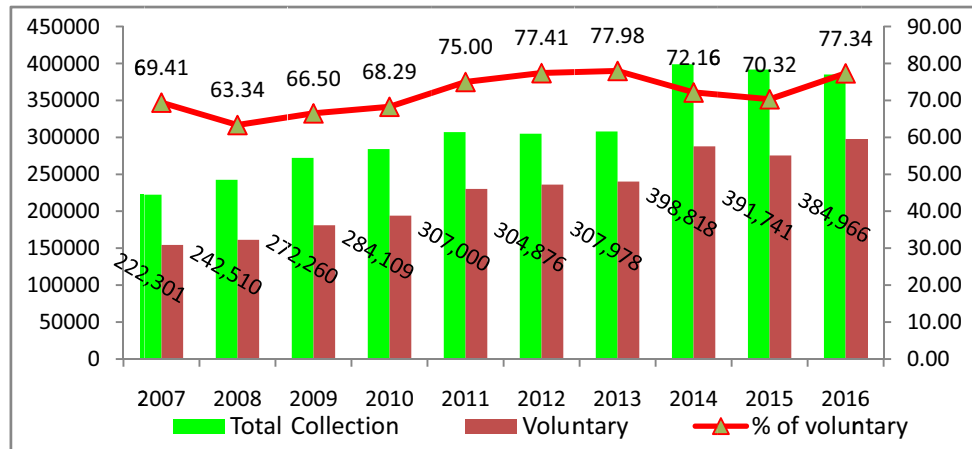


Figure 36: Sero positivity of 5 transfusion transmitted diseases

State Blood Transfusion Council (SBTC) is there to work for Blood safety in the state. Joint Director Blood safety works as the Director of SBTC. All the programs for Blood Safety is managed by SBTC.

Programs organised in Blood Safety division and SBTC:

world Blood Donors Day on 14<sup>th</sup> June and National Voluntary Blood Donation Day on 1<sup>st</sup> October is observed each year for promotion of Voluntary Blood donation camp and for aware public for voluntary blood donation

List of Blood Banks in Odisha State annexed at **Annexure 2**

### STI/RTI

There are 40 Designated STI and RTI Clinics (DSRC) established in different health institutions like Medical Colleges, District Head quarters' Hospital and Sub Divisional Hospitals. DSRC is an exclusive clinic for STI treatment in the hospitals managed by a medical officer appointed by NHM and a counsellor appointed by SACS. Contractual Medical Officer appointed with National Health Mission (NHM) or Existing Skin & VD Specialist or any other Medical Officer designated as STI MO work as MO I/C in the DSRC.

The patients with complains of STI and RTI are enrolled in a Master Register and diagnosed for any STI RTI. For each patient with symptoms a case card is maintained separately. Symptomatic STI cases and their partners are treated with colour coded STI/RTI drug kits under Syndromic Case Management guidelines laid down by NACO. They are referred to ICTC for HIV and RPR test

in single prick. HIV positive cases are referred to ART Centres and RPR reactive cases are treated with Kit-3 or Kit-4. HRGs from the nearby TI Projects refer High Risk Group population (HRG) to DSRC for Regular Medical Check –up every three months and suspected cases for treatment. The newly registered HRG and the are given presumptive treatment that is Kit 1 (Azithromycin and Cefixime) or treatment according to symptoms. They are also undergone RPR test for Syphilis twice a year. From ICTCs the clients with the symptoms are referred to the DSRC by the ICTC counsellor.

STI / RTI treatment and other activities for control of STI and RTI is going on in 614 facilities and one state reference

**Table: 21**

Type of facility	Number of facilities
Designated STI/RTI clinics	40
TI NGOs	53
TI STI private providers	167
CHC and Sub divisional hospitals which have been designated as NHM facilities	401 (377 CHC and 24 SDH)
State Reference Centre	1
TI STI Providers (PPP providers)	167
<b>Total</b>	<b>615</b>

center in Dept of Microbiology, SCB Medical College in the state which includes Targeted Intervention (TI) NGO and NHM .



Table 22: STI / RTI case treatment in different facilities

Type of the Centres	Achievements
DSRC	181196
TI STI clinics	30117
Pvt sector	5638
Sub-Total	216951
NRHM facilities	118554
<b>Total</b>	<b>335505</b>

During this year 78555 nos.of patients have been undergone RPR test for syphilis and out of them 320 were found reactive and proper treatment with Kit 3 and Kit 4 prescribed by NACO.

High risk population from Targeted Interention NGOs 53977 in number were undergone Regular Medical Check up (RMC) during 2016-17.

Figure 37: Referral to ICTC and HIV detection 2010 to 2016

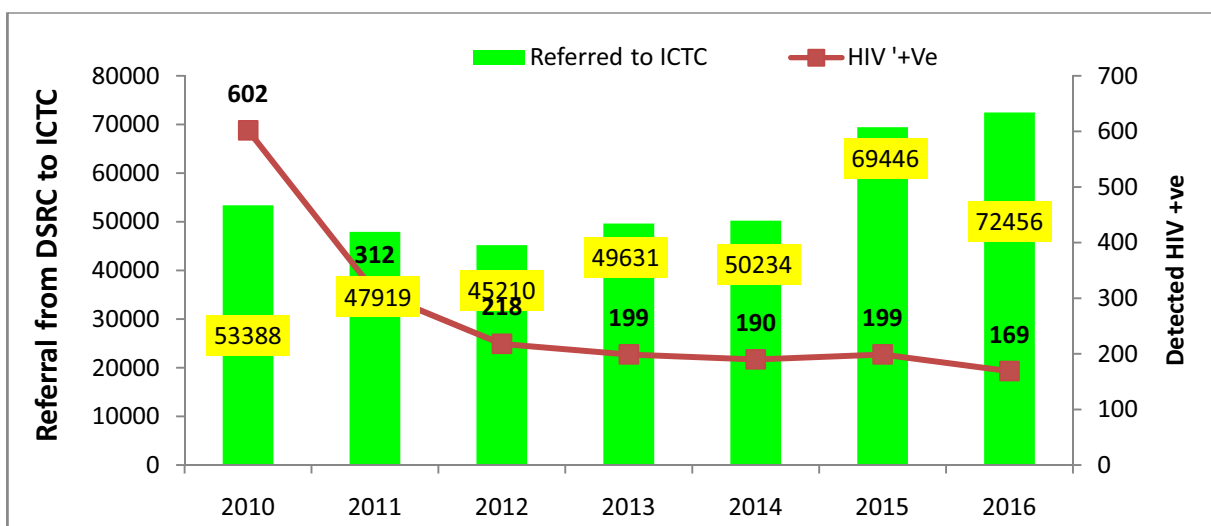


Figure 38: ANC RPR for Syphilis reactivity detected in DSRC 2016-17

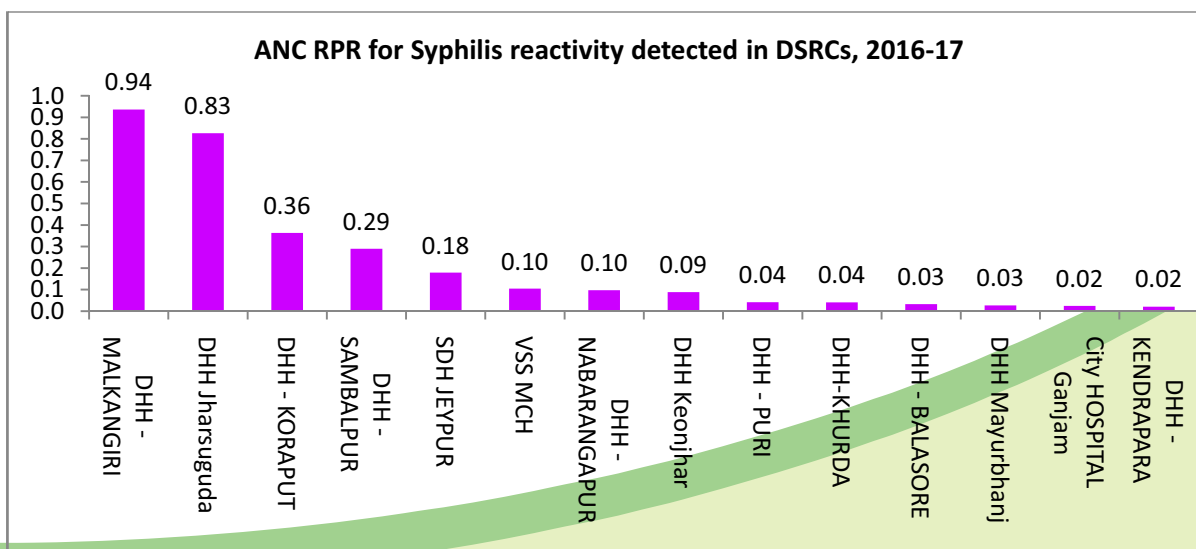


Fig : 39 HIV &amp; VS RPR reactivity among the DSRC attendees

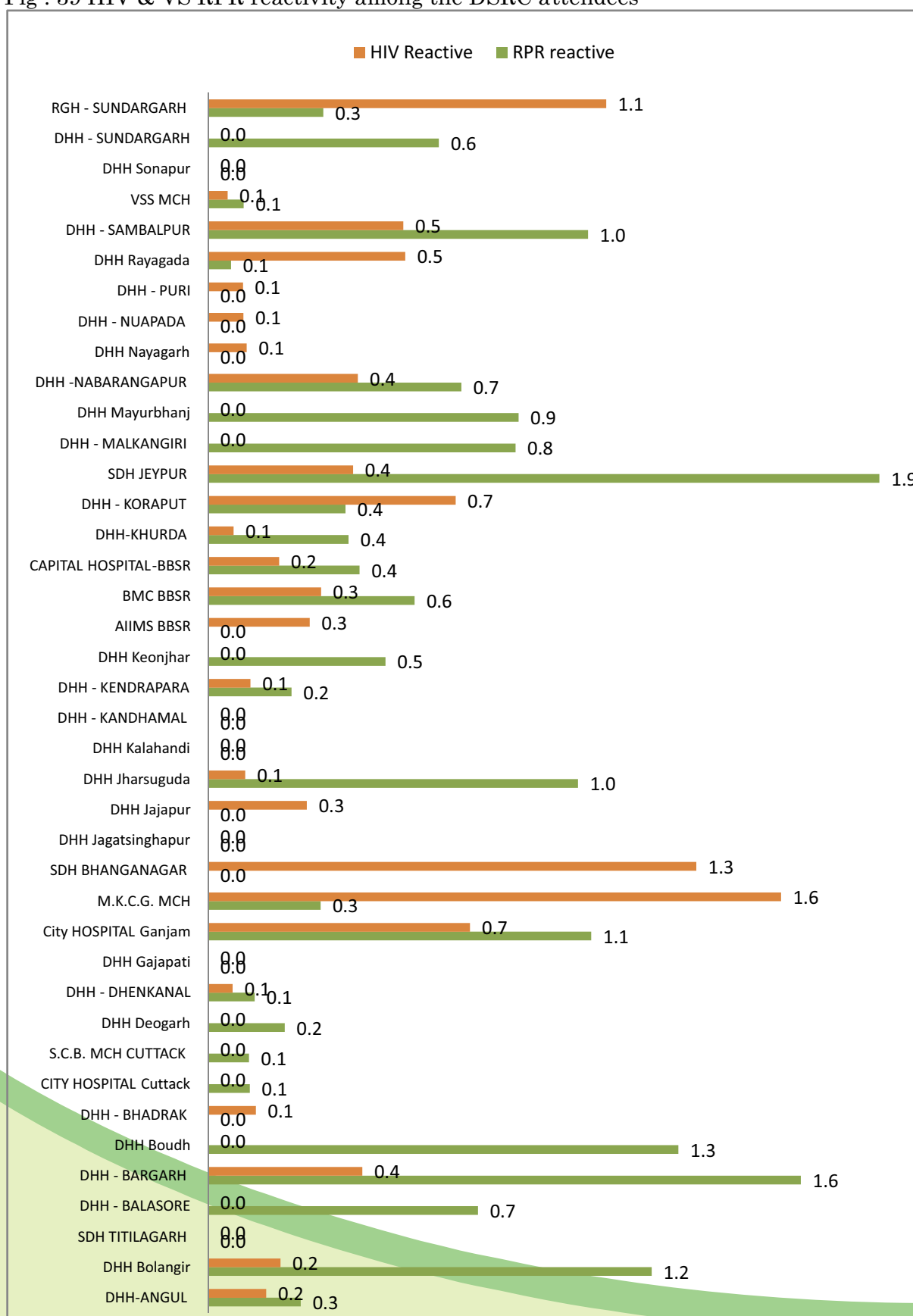




Figure 40: Partner Management



**Activities undertaken during the year 2016-17:**

- Status of setting up of new clinics :** There was no target allotted for establishing new DSRC facilities. One State Reference Centre allocated for Odisha was established in 2016-17.
- Status of STI/RTI service delivery for HRGs in TI NGOs:** STI service delivery is happening through static clinics and clinic managed by Preferred Private Providers identified by the TI NGOs. They have signed MOUs with the NGO for the project period. During the visit of HRGs to ICTCs and Govt facilities the STI services are also provided by the govt facilities.
- Status of partnership with organized public sector and private sector:** Around 21 industries and corporate sectors have

Fig : 41 State level TOT on RPR



signed MOU with OSACS for implementing HIV/STI prevention programmes under Employer Led Model. They are screening for STI / HIV and performing tests and reporting on monthly basis through FICTCs.

- Status of state and district level convergence with NHM:** (with specific reference to availability of STI/RTI drug kits, training of CHC and PHC staff and data consolidation, involvement of SACS in inclusion of STI/RTI plan in state

RCH II PIP) Apart from 40 DSRCs supported by OSACS, there are 377 CHCs and 24 Sub-Divisional Hospitals which are providing STI / RTI services. NHM is supporting for:

- Training of Medical Officers, Staff Nurses and ANMs on Syndromic Case management for STI/ RTI and Lab Technicians on RPR and other tests for STI/RTI .

- Supplying STI/RTI syndromic case management drug kits in colour coded packs (or assembled generic drugs) from state drug budget for all these 402 facilities. In case of stock out of drugs in DSRCs and NGO TI clinics, these drugs are being used.

- NHM has engaged contractual Medical Officers as MO (STI) in 9 districts.

- Rolling out “Elimination of Congenital Syphilis “ programme in convergence with NHM. The Maternal Health counterpart of state health department has been proposing a budget for training,

#### 6. Procurement :

- a. Status of consumables: Few consumables were procured e.g. printing of registers and leaflets were done and distributed.(Master Register, Patient Dairy & Stock Register is printed 100 nos. each, 2000 booklet – screening for syphilis during pregnancy, 2000 leaflet on congenital syphilis and 100000 alcohol swab)

procurement of POC test kits and RPR test kits for last two years.

#### 5. Training details :-

A) Out of 120, 79 PPP doctors of all the TI Projects are trained on “STI/RTI Syndromic Case Management” during the year.

B) State Level TOT on “Screening for Syphilis during Pregnancy” for the year 2016-17 of 10 districts was conducted on 27<sup>th</sup> Feb, 2017 at Hotel VITS, Bhubaneswar. This training was conducted from NHM budget and 19 nos. of Doctor & 9 nos. of LTs were trained. 2 to 3 doctors and one laboratory technicians from Angul, Balasore, Bhadrak, Dhenkanal, Jajpur, Jagatsinghpur, Kendrapara, Keonjhar and Puri district were trained.

- C) 134 doctors and 265 ANM, LHV & SNs are trained on “Congenital Syphilis during Pregnancy” in Cuttack, Ganjam, Gajapati, Khurda & Rayagada district.

- b. Status of Infrastructure strengthening: No target for establishment of new DSRC during the year 2016-17

- c. STI/RTI Drug Kits and RPR Test kits are supplied from NACO and OSMCL, Odisha.

The stock status at DSRC during the year 2016-17 is mentioned below: Table : 23

KITS	Consumption	KITS	Consumption
Kit-1	26407	Kit-5	4760
Kit-2	25424	Kit-6	8719
Kit-3	171	Kit-7	392
Kit-4	1851	RPR	188317

## 7. Supervision and Monitoring:

Supporting supervision and monitoring has been conducted by SACS, Technical Support Unit (TSU) STI focal persons and STI mentors:

Table 24 Supervision and Monitoring

Supervisors	No. of DSRC	PPP/TI NGO	NHM Facilities (PHC/ CHC / SDH	Pvt or PSU health facilities
DD STI	24	69	103	7
PO TSU	35	120	72	11
STI Mentors	40	46	401	5
<b>Total</b>	<b>99</b>	<b>235</b>	<b>576</b>	<b>23</b>

B) One Review Meeting of Counsellors from 40 DSRC were held on 17.03.2017 and counsellors from all the DSRC attended the review meeting.

## 8. Status report on State Reference centre:

State Reference Centre is established in September, 2014, Lab Technician is placed at Microbiology

A) Status of Supportive Supervision in the table below:

Department of SCB MCH, Cuttack. 2526 nos. of RPR test done and 365 nos, of Gramstain done during this year. The activities of SRC are being reported on monthly basis to SACS and NACO and The Institute of Serology, Kolkata is identified as Regional STI and RTI Research Centre / Laboratory for Odisha.

## SIMU (Strategic Information Management Unit)

**Management of SIMS (Strategic Information Management System) software:** Strategic Information and Monitoring System (SIMS) is a Web-based application for data entry at all the reporting units in state, district, sub-district level which includes all service delivery units functioning in the state. It provides differential data management rights to all the users. It is used by the counsellors of ICTC, DSRC, system support engineers and trained authorised persons from blood banks, programme managers (PM) of TI projects, and district resource persons (DRP) of LWS projects for reporting their monthly performances. In the SACS the data is validated and forwarded to the main server at NACO. If there is any problem in the reporting then it is redirected to the counsellor

and then it is forwarded to NACO after rectification. Data is stored and managed in Meghraj Cloud system of Government of India.

The Strategic Information Management Unit of OSACS has following major responsibilities.

Fig : 42 Hands on training SIMS



- Training for the counsellors of ICTC, DSRC, PM of TI and others regarding SIMS software (Induction for new counsellors who joined recently and refresher for others). During the financial

- year all TI, DSRC & blood bank users were undergone hands on training.
- ii. Handholding support and supervision of all the units to ensure online SIMS report timely.
  - iii. Preparation of spreadsheet for all the program reviews: ICTC, STI/RTI, HIV-TB, TI and ART and DAPCU.
  - iv. Analysis and interpretation of reports on quarterly and annual basis.
  - v. Generating Quarterly SIMS review reports for all wings.

#### Orientation and Training:

- i. SIMU division conducted training for system support engineers and laboratory technicians of Blood banks for data entry in SIMS software and it was in two batches; 42

. Table 25: Data entry status in SIMS (RU wise)

Sl No	Component	Active Reporting Units	Units reported	Units not reported	% of reporting
1	ICTC	226	218	8	97
2	TI	46	44	2	96
3	STI	86	83	3	97
5	IEC/ Mainstreaming	1	1	0	100
6	BB	71	51	20	72
	Total	430	397	33	

#### HIV Sentinel Surveillance (HSS) for Antenatal Cases (ANC):

HIV Sentinel Surveillance (HSS) is being conducted alternate year for antenatal cases (ANC) or pregnant women and High risk group population to know the HIV trend in the group of people by district and state. HSS among

participants attended the training.

- ii. i. There was also a hand holding and computer based training for counsellors of facility integrated ICTC and new DSRC counsellors regarding SIMS and 21 participants attended the training.



Fig : 43 DAPCU review

pregnant women is conducted among ANC clinic attendees and this information is used as proxy of general population. Linked anonymous method is used for the ANC surveillance. As the HIV positivity in a year in the Targeted Intervention Projects is not the true positivity among HRG the HSS is also being conducted for HRG to know the



HIV prevalence among different groups and to know the trend. During the year 2014-15 there was a plan to conduct HSS both for pregnant women and high risk group and bridge population but as per instruction of NACO only HSS for ANC was conducted nationally and also in the state. HSS for pregnant women was undergone in the state as well as country from 2.2.17 to 30.4.17.

**Training:** Training for HSS for pregnant women was undergone in two batches from 18.1.17 to 21.1.17 and the training period was of two days. The Medical officer in charge of ICTC who acted as the site in charges, the counsellor and laboratory technicians attended the training. 36 laboratory technicians, 32 counsellors and 26 Medical Officers attended the training. Mr A Elangovan, Scientist F and Mr Santhakumar, Scientist D attended the training. Two counsellors were trained separately after the usual training. The medical officers were trained onsite by the Regional Institute team members and State Epidemiologist OSACS during their supervision.

**Program Implementation:**

HSS for ANC sites started on 2.2.2017 and completed on 30.4.2017. Linked anonymous testing method is used in the surveillance. Consecutive sampling method was adopted for blood collection. The blood samples were collected maximum of 20 per day after filling up of a questionnaire during the HSS period of 3 months. Serum was separated and 2 ml serum is preserved in a cryovial with the individual sample id and date of collection. The other part is tested for HIV and RPR if the client gives consent for HIV or RPR or both and she gets the report for the test

performed. The serum samples preserved in refrigerator were transported to the identified testing center by the laboratory technicians on weekly basis under proper cold chain. There were 3 testing centers in the Department of Microbiology of three old Government Medical Colleges SCB Medical College Cuttack, MKCG Medical College Berhampur and VIMSAR Burla. The serum samples were tested for HIV and VDRL. Two test strategy is adopted for both the tests and the test reports were sent to the Regional Institute National Institute of Epidemiology (NIE) Chennai. The sentinel site sends the data forms to NIE Chennai by speed post along with the data form transportation sheets. Data entry is conducted in the regional institute and the data entry is validated and transmitted to NACO.

**Quality Assurance:**

The testing laboratories send 10 % of all the negatives (Initial digit for SCB Medical College was '0', for MKCG MC it was '1' and for VIMSAR it was '2') and all the positives to National Reference Laboratory NICED Kolkata with sample transportation sheets thrice during the HSS period. All the samples were found concordant.

**Supervision & Monitoring:**

- i. Central team member from NIHFV visited Area Hospital Aska, CHC Hinjilikut, City Hospital Berhampur, SCB Medical College Cuttack, DHH Bhadrak, DHH Angul sites.
- ii. Regional Team members: 5 members from NIE Chennai visited the sentinel sites and imparted supportive supervision from the second day of initiation of sentinel



- surveillance in the state. They supervised all the sentinel sites within the first week.
- iii. There were 7 State Supervision Team members (SST members) in the state and they were from Government health system of Odisha state. They were trained in NIE Chennai and conducted supportive supervision at least once in all the sites.
- iv. State Epidemiologist, DD (SS ME) and AD (ME) supervised all the sentinel sites in the state.

The comments are entered in the SIMS software by the supervisors on the day of visits and OSACS enter the correction measures against the same. It is also reflected in the SIMS software.

**Table : 26 Number of HIV Sentinel Sites Odisha state:**

SI No	Years	ANC sites	HRG sites					
			FSW	MSM	IDU	SMM	TG	Trucker
1	2010-11	32	12	6	4	1	0	0
2	2011-12							
3	2012-13	32						
4	2013-14			IBBS				
5	2014-15	32						
6	2015-16							
7	2016-17	32						



Fig: 44 Data form fill up by the counsellor

Fig: 45 Blood collection by laboratory technician



Fig: 46 Supervision by the RI Team member

Fig: 47 Supervision by the SST

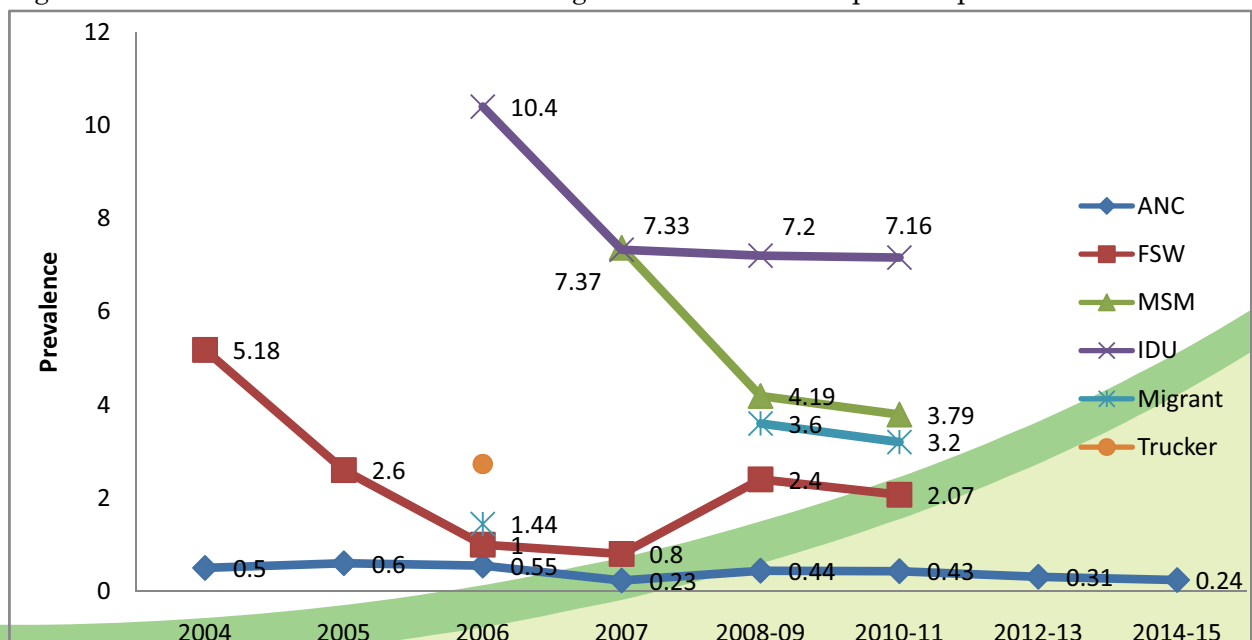


Table 27: Process of HIV Sentinel Surveillance

Sl No	Information	ANC sites	HRG sites	Remarks
1	Sentinel sites	2016-17: 32 sites	2010-11: 23 sites 2014-15: IBBS	Both ANC & HRG are consistent sites.
2	Regional Institute (RI) for technical support	National Institute of Epidemiology (NIE) Chennai	The same	Fixed by NACO
3	Blood sample collection	400 in number from each site	250 dry blood spot (DBS)	Time period: 3 months
4	Testing centres	Department of Microbiology SCB, MKCG Medical College and VIMSAR Burla	National Reference Laboratory, Institute of Preventive Medicine, Hyderabad	For ANC and HRG approved by NACO. Serum samples from ANC sites are transported by the lab tech. & DBS samples are sent by speed post.
5	External Quality Assay for lab.	NICED Kolkata		Fixed by NACO
6	Supervision and Monitoring	SACS officials, RI and State surveillance Team (SST) members, 1 member from Govt Med. Colleges & 6 doctors trained in pub health from periphery hospitals supervise and monitor with check list.		First round supervision is completed within the first two weeks of initiation of blood sample collection.
7	Data entry & matching	In NIE Chennai		

Comparison of HIV prevalence in the ANC HSS sites Annexure - 3

Figure 48: Trend of HIV Prevalence among different Sub-Groups of Population



## External Quality Assurance

In order to maintain the testing quality in the ICTC, 20% or all positive samples and 5% of all negative samples collected in the first week of each quarter in an ICTC are to be sent to the assigned State Reference Laboratories (SRL) for cross check. The SRL recheck the samples and give the report back to the ICTC. All the 3 SRL are in the Dept of Microbiology of the Govt Medical Colleges of Odisha SCB, MKCG Med College and VIMSAR Burla. Along with this EQAS paired sera is prepared in the SRL and dispatched to the all the ICTCs for

proficiency test twice a year. The ICTCs have been assigned to the SRLs according to distance and workload of the SRL. The kits and consumables required for EQAS is being calculated and included in the consumables of ICTC. The SRLs send the indeterminate samples to National Reference Laboratory (NRL) situated in National Institute of Cholera and Enteric Diseases (NICED) Kolkata which has been assigned to Odisha state and participate in NEQAS and proficiency tests conducted by NRL.

Table 28: EQAS Retesting 2016-17

Target 2016-17	EQAS Participation (ICTC) Percentage				EQAS performance	
	Quarter	SRL participated	/ICTC	Percentage		
100%	April 16	SCB MC	67	84%	86%	100%
		MKCG MC	50			
		VIMSAR	45			
	July 16	SCB MC	76	87%		
		MKCG MC	47			
		VIMSAR	50			
	October 16	SCB MC	77	85%		
		MKCG MC	45			
		VIMSAR	48			
	January 17	SCB MC	78	85%		
		MKCG MC	47			
		VIMSAR	47			

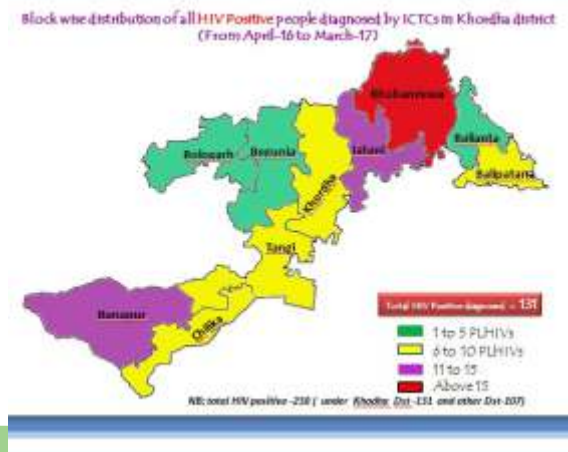
Table 29: EQAS for ICTC in Odisha 2016-17.

Quarters	Samples tested for EQAS		Total sample tested	No of discordant
	HIV + ve	HIV - ve		
April 2016	62	801	863	0
July 2016	71	862	933	0
October 2016	77	848	925	2
January 2017	58	971	1029	0

### District AIDS Prevention and Control Unit (DAPCU)

DAPCU came to existence during 2007-2008 in all the 7 'A' and 'B' category districts of Odisha; Anugul, Balasore, Bhadrak, Bolangir, Khurda, Koraput and Ganjam. In each unit there is one DPM, one Monitoring Evaluation assistant, one ICTC supervisor, one Accountant cum office assistant for smooth management of the HIV activities and for National AIDS Control Program. The DAPCU units coordinate with the Nodal officer for HIV in the district and supervise all the activities in the district. They conduct the DAPCC meeting quarterly under the chairmanship of District Collector and monthly meeting under the chairmanship of CDMO. In these meetings all the activities regarding HIV is reviewed and necessary decisions are been finalised. They prepare the spatial map each year and do the block wise analysis for the factors affecting the spread of HIV and HRG concentration in the blocks, HIV positivity and TB positivity in the blocks.

Fig : 49 Spatial Map of Khurda district March 2017:



### Activities conducted by DAPCU: Bolangir DAPCU:

- DAPCC Meeting 12.04.2016: Concession to PLHIV in Govt. & Pvt. Carriers for attending ART Center was approved by District Collector and till November 2017 total 71 nos. of same pass have been issued.
- DAPCC Meeting on 28.09.16: Livelihood support to PLHIV through Sujog Scheme: Till November 2017 one PLHIV has received Rs 15000/- support through Sujog Scheme for Laundry Shop.
- DAPCC meeting on 13.1.17:
  - Dissemination of HIV/AIDS message on Labour Security Card.
  - Entitlement of Aadhar card for Transgender (TG) community with the third gender. 12 nos. trans genders have received Aadhar card and 6 have applied.

Fig: 50 HIV AIDS Message has been printed on the labour security card Bolangir district.

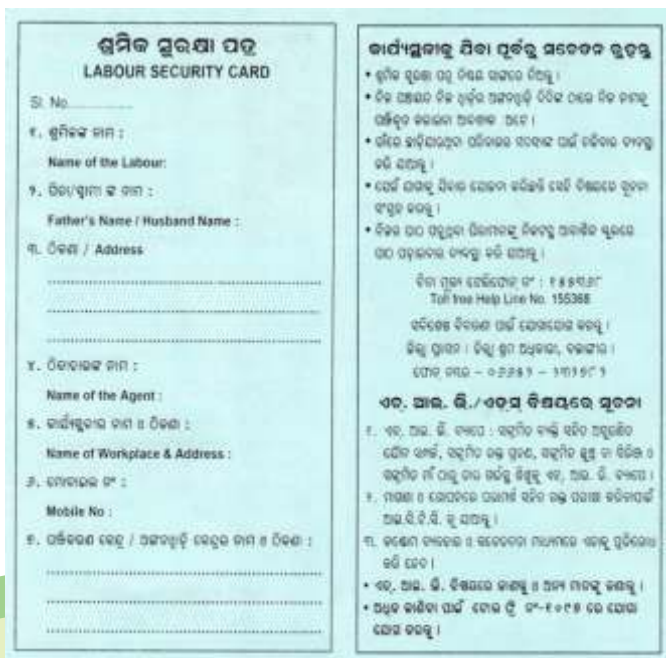






Fig:51 One day Training workshop of official of Line Departments DAPCU Angul

### **District Level Training of ANMs in Angul District**

District Level Training of ANMs of Angul District on HIV/AIDS was conducted in four batches 20<sup>th</sup>, 21<sup>st</sup>, 27<sup>th</sup> & 28<sup>th</sup> February-2017 in the CDMO Conference Hall & NHM Training Hall.

Objective of the training program:

1. To create awareness on HIV/AIDS.
2. Reduction of stigma & discrimination towards HIV positive clients.
3. To develop linkage of with ICTC/ FICTC / DAPCU, To sensitize all ANMs of Angul District regarding their duties & responsibilities towards HIV testing clients specially ANC clients / positive clients & prevention & control of HIV/AIDS.



Fig : 52 Sensitization of ASHA Sathi

4. Sensitization of the ANMs of Angul District regarding social benefit schemes applicable for PLHIV.



Fig:53 Sensitization of ANM & AWW



### **District Level Training of ASHA of Angul District**

District Level Training of Anganwadi workers of Angul District on HIV/AIDS was conducted in two batches 20<sup>th</sup> - 21<sup>st</sup> & 27<sup>th</sup>- 28<sup>th</sup> February-2017 in the NHM Training Hall and 184 ASHA participated in the training program.

### **District Level Training of ASHA supervisor/ SATTHI of Angul District:**

One day district level training Of ASHA supervisor/ SATTHI of Angul District for the Year 2016-17 was conducted on 26.9.16 in the NHM Training Hall and 43 participants attended the training.



### Activities in Photographs



Advocacy with Transporters



Health Camp



## Annexure 1: Care &amp; Support facilities in the state

Sl No	District	Year	ART Centre	LinkART Centre	CSC	Help Desks
1	Anugul	2010	DHH, Angul		NAP+, Angul	
2	Balangir	2010	DHH, Balangir		BNP+, Balangir	
3	Balasore	2010	DHH, Balasore		SNP+, Balasore	
4	Bargarh			DHH, Bargarh		
5	Baudh			DHH, Baudh		
6	Bhadrak	2014	DHH, Bhadrak			ANP+
7	Cuttack	2008	SCB MCH, ART + center		USS, Cuttack	
8	Deogarh			DHH. Deogarh		
9	Dhenkanal			DHH. Dhenkanal		
10	Gajapati			DHH. Gajapati		
11	Ganjam	2006	MKCG MCH, Berhampur	Aska CHC	GNP+Berhampur	
		2014	SDH Bhanjanagar	Polsara CHC		
				Khalikote, CHC		
12	Jagatsinghpur		DHH, Jagatsinghpur			
13	Jajapur			DHH, Jajapur		
14	Jharsuguda		DHH,	Jharsuguda		
15	Kalahandi			DHH, Kalahandi		
16	Kandhamal		DHH,	Kandhamal		
17	Kendrapara			DHH, Kendrapara		
18	Keonjhar			DHH, Keonjhar		
19	Khordha	2009	Capital Hospital, Bhubaneswar		KNP+ Khurda	
20	Koraput	2009	DHH, Koraput (PPP mode ART Center)		NKP+, Koraput	
21	Malkangiri			DHH, Malkangiri		

Sl No	District	Year	ART Centre	Link ART Centre	CSC	Help Desks
22	Mayurbhanj			DHH, Mayurbhanj		
23	Nabarangapur	2015	DHH, Nawarangpur			
24	Nayagarh	2015	DHH, Nayagarh (Facility integrated ART Center)			
25	Nuapada			DHH, Nuapada		
26	Puri	2015	DHH, Puri			
27	Rayagada	2015	DHH, Rayagada (Facility integrated ART Center)			
28	Sambalpur	2009	VSS Medical College, Burla		SNPP+, Sambalpur	
29	Sonapur			DHH. Sonepur		
30	Sundargarh	2010	RGH Rourkela		SEWAK	
**	ART Plus center: SCB Medical College Cuttack					

### Annexure 2: List of Blood Banks in Odisha State

SL No	NAME OF BLOOD BANK	DISTRICT	TOTAL	VOLUNTARY			EXCHANGE			NO OF VBD CAMPS
				Male	Female	Total	Male	Female	Total	
1	ANGUL	Angul	10969	9198	645	9843	1109	17	1126	135
2	ANANDAPUR	Keonjhar	2255	1155	134	1289	955	11	966	20
3	M.K.C.G,BERHAMPUR	Ganjam	27460	15219	961	16180	11152	128	11280	228
4	BALASORE	Balasore	16548	14813	1085	15898	596	54	650	228
5	BOUDH	Boudh	2014	1930	8	1938	72	4	76	17
6	CAP.HOSP.B.B.S.R	Khurda	23479	16411	1015	17426	5990	63	6053	233
7	MUN.HOSP.B.B.S.R	Khurda	8098	7175	699	7874	214	10	224	151
8	BOLANGIR	Bolangir	7672	6109	208	6317	1354	1	1355	38
9	V.S.S.M.C.BURLA	Sambalpur	16332	7124	348	7472	8415	445	8860	103
10	BHANJANAGAR	Ganjam	3124	2665	197	2862	262	0	262	25
11	BHAWANIPATNA	Kalahandi	9863	1935	141	2076	7787	0	7787	45
12	BARIPADA	Mayurbhanj	8125	7176	882	8058	57	10	67	117
13	BARAGARH	Baragarh	12809	9933	420	10353	2428	28	2456	55

14	BHADRAK	Bhadrak	10560	8960	944	9904	606	50	656	134
15	BALIGUDA	Kandhamal	1422	713	53	766	650	6	656	17
16	BONAI	Sundergarh	1356	623	40	663	681	12	693	14
17	CHAMPUA	Keonjhar	1763	337	34	371	1356	36	1392	8
18	DHENKANAL	Dhenkanal	6883	5948	712	6660	197	26	223	66
19	DEOGARH	Deogarh	2586	2201	157	2358	218	10	228	17
20	DHARAMGARH	Kalahandi	2447	1842	13	1855	592	0	592	16
21	GUNUPUR	Raygada	1187	574	31	605	582	0	582	15
22	JAJPUR	Jajpur	5701	4384	690	5074	612	15	627	66
23	JEYPORE	Koraput	4373	2397	159	2556	1813	4	1817	42
24	JHARSUGUDA	Jharsuguda	8259	6781	183	6964	1295	0	1295	51
25	KARANJIA	Mayurbhanj	4398	1981	164	2145	2230	23	2253	26
26	KEONJHAR	Keonjhar	9787	4720	299	5019	4703	65	4768	60
27	KHURDA	Khurda	2577	2232	194	2426	151	0	151	48
28	KORAPUT	Koraput	5809	4592	740	5332	453	24	477	72
29	KENDRAPARA	Kendrapara	3659	2137	211	2348	1268	43	1311	36
30	KUCHINDA	Sambalpur	838	693	9	702	135	1	136	6
31	MALKANAGIRI	Malkanagiri	3511	2802	60	2862	649	0	649	36
32	NABARANGPUR	Nabarangpur	5509	1967	41	2008	3492	9	3501	33
33	NAYAGARH	Nayagarh	5809	4592	740	5332	453	24	477	74
34	NILAGIRI	Balasore	1874	1716	158	1874	0	0	0	37
35	NUAPADA	Nuapada	4103	901	89	990	3113	0	3113	30
36	PURI	Puri	4966	4130	511	4641	325	0	325	72
37	PHULUBANI	Kandhamal	5376	3643	187	3830	1538	8	1546	29
38	PARALAKHEMUNDI	Gajapati	3660	2283	105	2388	1270	2	1272	37
39	PATANAGARH	Bolangir	2877	2037	408	2445	408	24	432	18
40	PADMAPUR	Baragarh	3122	2206	79	2285	804	33	837	23
41	RGH ROURKELLA	Sundargarh	12780	11096	485	11581	1160	39	1199	82
42	RAYAGADA	Raygada	4118	3046	178	3224	887	7	894	33
43	RAIRANGPUR	Sundargarh	3146	2185	179	2364	751	31	782	18
44	TALCHER	Angul	3512	3123	235	3358	152	2	154	35
45	SAMBALPUR	Sambalpur	9550	8297	247	8544	1001	5	1006	52
46	SUNDARGARH	Sundargarh	4843	1132	110	1242	3542	59	3601	33
47	SONEPUR	Sonepur	4335	4122	136	4258	77	0	77	36
48	UDALA	Sambalpur	2353	1589	236	1825	526	2	528	25
49	JAGAT SinghPUR	Jagatsinghpur	1989	1704	177	1881	107	1	108	34
50	CRCBB,CUTTACK	Cuttack	44181	22272	2649	24921	18382	878	19260	270
51	TITILAGARH	Bolangir	3756	1066	69	1135	2612	9	2621	32
52	RAIRAKHOL	Sambalpur	1559	1303	77	1380	170	9	179	10
53	JAJPUR ROAD	Jajpur	1494	1087	128	1215	267	12	279	20
54	KANTABANJI	Bolangir	1803	649	75	724	1079	0	1079	19

55	ATTHAMALIK	Angul	1120	965	100	1065	52	3	55	17
56	SCBMC&HOSP,CTC	Cuttack	23943	13372	788	14160	9673	110	9783	96
<b>Total (Govt. + RedCross)</b>			<b>387642</b>	<b>255243</b>	<b>19623</b>	<b>274866</b>	<b>110423</b>	<b>2353</b>	<b>112776</b>	<b>3290</b>

Public Sector Blood Bank

57	MCL IB,Valley,Brajarajnagar	Jharsugu da	0	0	0	0			0	
58	NALCO,DAMANJODI	Koraput	45	44	1	45	0	0	0	0
59	NALCO,ANGUL	Angul	86	86	0	86	0	0	0	0
60	IGH,ROURKELLA	Sundarga rh	4340	2747	81	2828	1488	24	1512	12
61	N,SATABDI,TALCHER	Angul	479	463	16	479	0	0	0	0
62	HAL SUNABEDA	Koraput	161	161	0	161	0	0	0	0
63	CENTRAL JODA	Keonjhar	0	0	0	0			0	0

Private Sector Blood Bank

64	Kalinga Hosp, B.B.S.R	Khurda	4618	4443	110	4553	48	17	65	0
65	TATA REF,BELPAHAR	Jharsugu da	545	20	0	20	524	1	525	0
66	SUM, B.B.S.R	Khurda	8703	6473	98	6571	2089	43	2132	0
67	KIMS, B.B.S.R	Khurda	4389	2438	146	2584	1799	6	1805	0
68	AMRI HOSPITAL, BBSR	Khurda	3195	327	29	356	2803	36	2839	0
69	TISCO, JODA	Keonjhar	615	0	0	0	614	1	615	0
70	HI-TECH, B.B.S.R	Khurda	2235	35	4	39	2053	143	2196	0
71	HI-TECH, ROURKELA	Sundarga rh	1620	32	19	51	1541	28	1569	0
72	JYOTI.HOSP,BALASORE	Balasore	616	599	4	603	13	0	13	0
73	APPOLO HOSPITAL, BBSR	Khurda	4368	275	13	288	4006	74	4080	0
<b>Charitable Trust</b>										
74	C.HOSP,NABARANGPUR	Nabarang pur	2414	1943	0	1943	471	0	471	0
75	C.HOSP,BISAM,CTC	Rayagad a	2429	6	5	11	2406	12	2418	0
76	EVANGELICAL,KHARIA R	Nuapada	1490	1487	3	1490	0	0	0	0
77	CWS, Hospital, Rourkela	Sundarga rh	1191	13	0	13	1167	11	1178	0
78	ASHAKIRAN,LAMTAPUT	Koraput	291	0	0	0	280	11	291	0
79	C.M.H,BARAGARH	Baragarh	697	455	8	463	234	0	234	0
80	JMJ BAREIPALI	Sambalpu r	311	199	4	203	106	2	108	0
<b>Total (Private+ Public+ Charitable)</b>			<b>44838</b>	<b>22246</b>	<b>541</b>	<b>22787</b>	<b>21642</b>	<b>409</b>	<b>22051</b>	<b>12</b>
<b>Grand Total</b>			<b>432480</b>	<b>277489</b>	<b>20164</b>	<b>297653</b>	<b>132065</b>	<b>2762</b>	<b>134827</b>	<b>3302</b>



**Annexure 3: Comparison of HIV prevalence in the ANC HSS sites 2010-11 to 2014-15**

HIV Prevalence ANC sites 2010-11, 2012-13, 2014-15					
SL.No	District	Name of the Site	HIV Prevalence		
			2010-11	2012-13	2014-15
1	Angul	Angul D.H.H.	1.26	0.5	0.25
2	Balasore	Balasore D.H.H.	0.25	1.5	1
3	Bargarh	Bargarh D.H.H.	0.75	0.5	0.25
4	Bhadrak	Bhadrak D.H.H.	0.50	0	0.25
5	Bolangir	Bolangir D.H.H.	0.00	0.25	0.25
6	Boudh	Boudh, D.H.H.	0.00	0	0.25
7	Cuttack	SCB MCH, Cuttack	1.50	1.75	1
8	Deogarh	Deogarh, D.H.H.	0.50	0.25	0.25
9	Dhenkanal	Dhenkanal, D.H.H.	0.00	0.25	0.25
10	Gajapati	Gajapati, D.H.H.	0.75	0	0
11	Ganjam	City Hospital, Berhampur	0.75	0.88	0.75
12	Ganjam	Aska, Hinjilikatu			
13	Jagatsinghpur	Jagatsinghpur, D.H.H.	0.00	0	0
14	Jajpur	Jajpur, D.H.H.	0.82	0	0
15	Jharsuguda	Jharsuguda, D.H.H.	0.25	0.25	0.75
16	Kalahandi	Kalahandi, D.H.H.	0.00	0	0.75
17	Kandhamal	Kandhamal, D.H.H.	0.25	0	0
18	Kendrapada	Kendrapara, D.H.H-II.	0.25	0.25	0
19	Keonjhar	Keonjhar, D.H.H.	0.25	0	0
20	Khurda	Capt.Hosp, BBSR	1.00	0	0.25
21	Koraput	Koraput, D.H.H.	0.50	0.13	0.13
22	Koraput	Jaypore, Sunabeda, Pattangi			
23	Malkangiri	Malkangiri, D.H.H.	0.50	0	0
24	Mayurbhanj	Mayurbhanj, D.H.H.	0.50	0	0
25	Nawarangpur	Nawarangapur, D.H.H.	0.50	0.25	0.25
26	Nayagarh	Nayagarh, D.H.H.	0.50	0	0.25
27	Nuapada	Nuapara, D.H.H.	0.50	0	0
28	Puri	Puri, D.H.H.	0.00	0.5	0.25
29	Rayagada	Rayagada, D.H.H.	0.50	1.5	0
30	Sambalpur	VSS MCH, Burla	0.00	0.25	0.25
31	Sonepur	Subarnapur, D.H.H.	0.00	0	0
32	Sundargarh	RGH, Rourkela	0.25	0	0
	State Average		0.43	0.31	0.24





Published by:  
**Odisha State AIDS Control Society**  
Dept. of Health & Family Welfare  
e-mail : orissasacs@gmail.com  
Phone No.: 0674-2393235, Fax : 0674-2394560

**BN. Print House**  
bnprinthouse@gmail.com  
9861164694 / 9338371009