

Ministère de la Santé Publique et de la Population (MSPP), HAITI

Use and Perspectives of the Oral Cholera Vaccine (OCV) as a component of the Cholera Response

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Outline

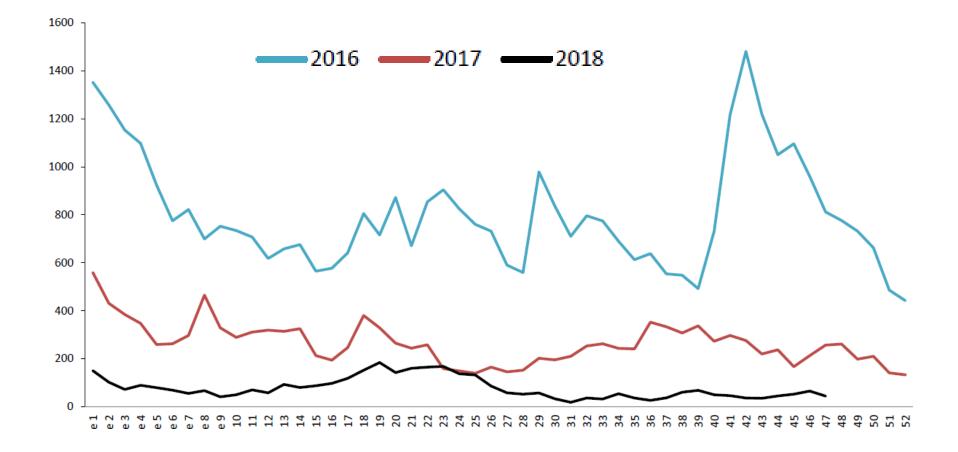
- A- Cholera epidemiological situation
- B- The OCV choice by the MSPP
- C-Use of the vaccine in the fight against cholera
 - Immunization campaigns (vaccination areas and coverages)
 - Profile of cholera in relation to campaigns
 - Comments
- D- Horizon for the use of OCV
- E- Conclusions

A- Cholera epidemiological situation

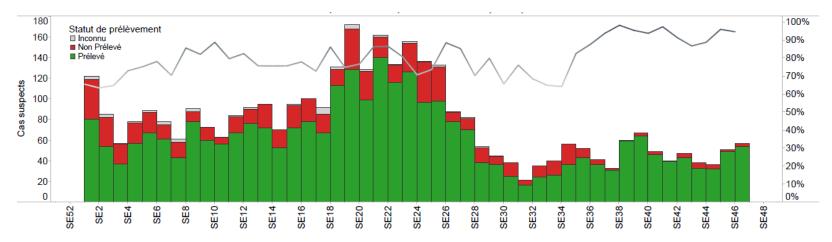
Suspected Cholera Cases

Year	Population	Suspected Cases	Institutional Deaths	Community Deaths	Total deaths	Incidence (x1,000 hab)
2010	10,085,214	185,351	2,521	1,580	4,101	18.38
2011	10,248,306	352,033	1,950	977	2,927	34.35
2012	10,413,211	101,503	597	311	908	9.75
2013	10,579,230	58,574	403	184	587	5.54
2014	10,745,665	27,392	209	88	297	2.55
2015	10,911,819	36,045	224	98	322	3.30
2016	11,078,033	41,421	307	140	447	3.74
2017	12,201,437	13,681	110	49	159	1.12
**2018	12,542,135	3,644	0	21	41	0.29

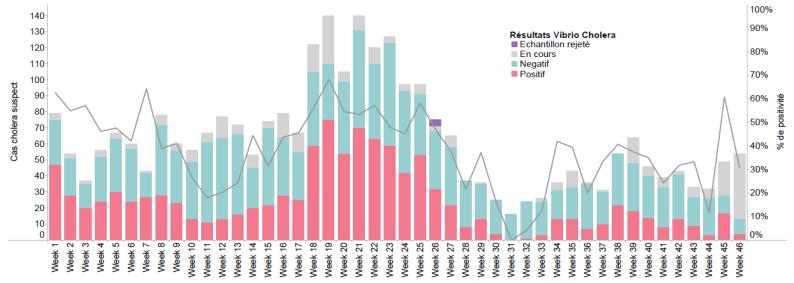
Suspected Cholera cases 2016-2018 (EW 47)



Sampling (80% of suspected cases sampled in 2018)



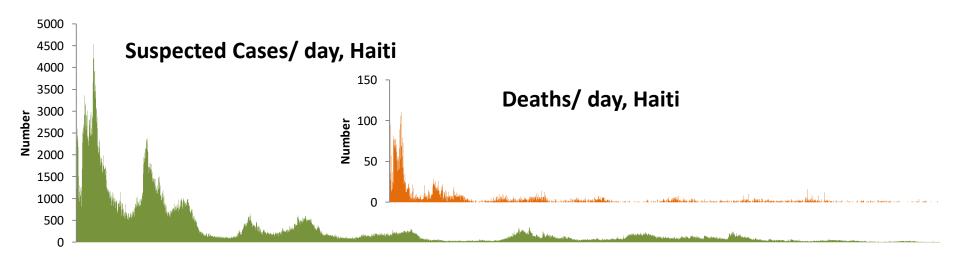
Lab Results (43% of positives in 2018)



B- The OCV choice

Oral Vaccination against Cholera (OCV)

- High epidemic burden in the beginning : up to 4500 cases/ week
- Immunologically naive population against V. Cholerae
- WHO recommendation accepted by MSPP
- Vaccination included in the response plan from the government and partners
- Coupling envisaged with WASH for high efficiency
- Vaccination as an auxiliary tool and not in continuous programming



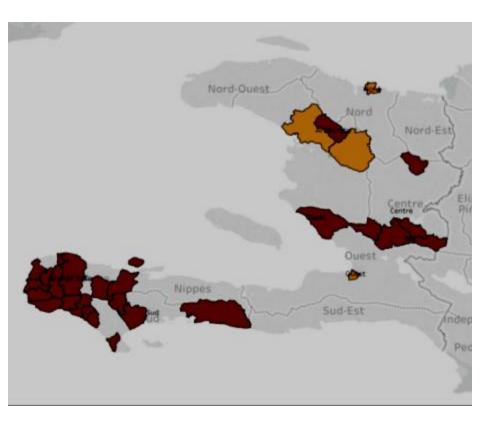
Oral Vaccination against Cholera (OCV)

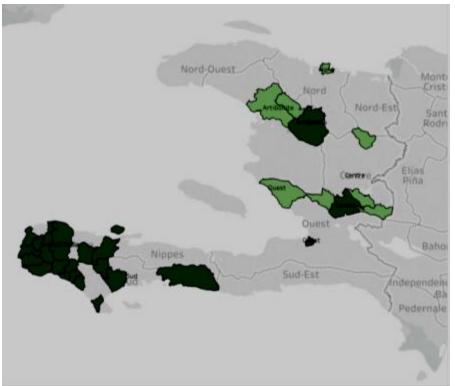
	Source areas that are at least 50% of weeks on red alert since 2014 and disseminate the disease in the surrounding municipalities
	Communes in red alert from 25 to 50% of weeks, that can support transmissibility
ALL	Communes in red alert from 25 to 50% of weeks, but playing a smaller role by their geographical position in "end of line"

Alerte Rouge

- a. ≥1 suspected cholera death
- b. ≥10 suspect cases
- c. Grouping of more than 5 suspect cases from a restricted geographical area
- d. At least one positive culture for Vibrio cholerae







Targeting Strategy

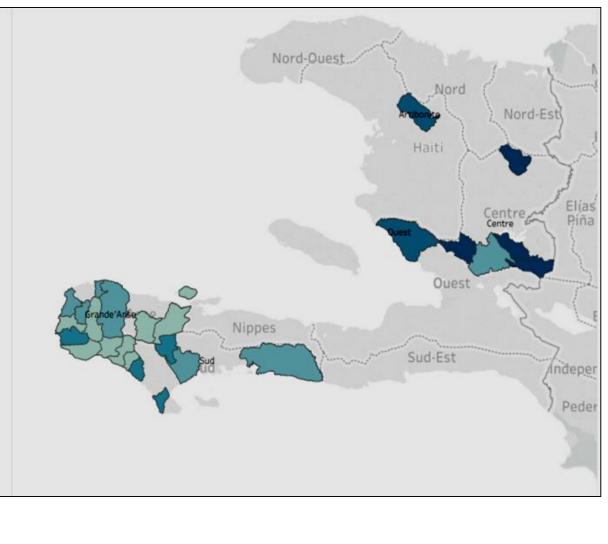
Communes fully vaccinated

Communes partially vaccinated

Vaccination period

Vaccination between 2012 and 2015: short term plan

Vaccination between 2016 and 2018: medium term plan



Vaccination coverage (2 doses of OCV) 52.90 105.00 Big variation among two-doses OCV coverage: from 53 to 105%

OCV objectives for 2016-2018

- Vaccinate 745,797 people in the Central Department
- Vaccinate 1,726,511 people in the department of Artibonite
- Promote hygiene, sanitation and health; before, during and after immunization activities
 - Cholera outbreak post Matthew Hurricane (Oct 2016): Immunization Campaigns in the South

OCV Campaigns - Pilotes, Haiti, 2012

Department	Commune	Communal Section	Urban/Rural	Target Population	2 doses	Vaccination coverage (2 doses)
Ouest	Port-au-Prince	Neighborhoods around GHESKIO	Urban	70,000	47,520	68%
Artibonite	Saint Marc and Grande Saline	Bokozel and Grande Saline	Urban/Rural	50,000	41,242	82%
Total				120,000	88,492	74%

Pilot campaigns conducted by:

- GHESKIO: Groupe Haïtien d'Etude du Syndrome de Karposi et des Infections Opportunistes (Ouest)
- PIH: *Partners in Health*, NGO working in Haiti (Artbonite)

OCV Campaigns, Haiti, 2013-2016

Department	Commune	Communal Section	Urban/Rural	Target Population	2 doses	Vaccination coverage (2 doses)
Nord	Cap-Haïtien	Petite Anse	Urban	86,989	80,376	92%
	Cerca Carvajal	All	Urban/Rural 20,917 22		21,874	105%
	Lascahobas	All	Urban/Rural	39,645	39,609	100%
Centre	Savanette	All	Urban/Rural	Jrban/Rural 31,324 30		96%
	Mirebalais	Sarazin	Rural	12,975	12,900	99%
	Saut d'Eau	All	Urban/Rural	33,449	35,152	105%
Artibonite	Ennery	All	Urban/Rural	44,208	40,313	91%
	Gonaives	Poteau	Rural	15,884	16,016	101%
	Arcahaie	5e Delices	Rural	8,900	9,246	104%
Ouest	Prison	16prisons	Urban/Rural	5,861	5,625	96%
	Arcahaie	All	Urban/Rural	118,097	106,054	90%
	T	otal	418,249	397,213	95%	

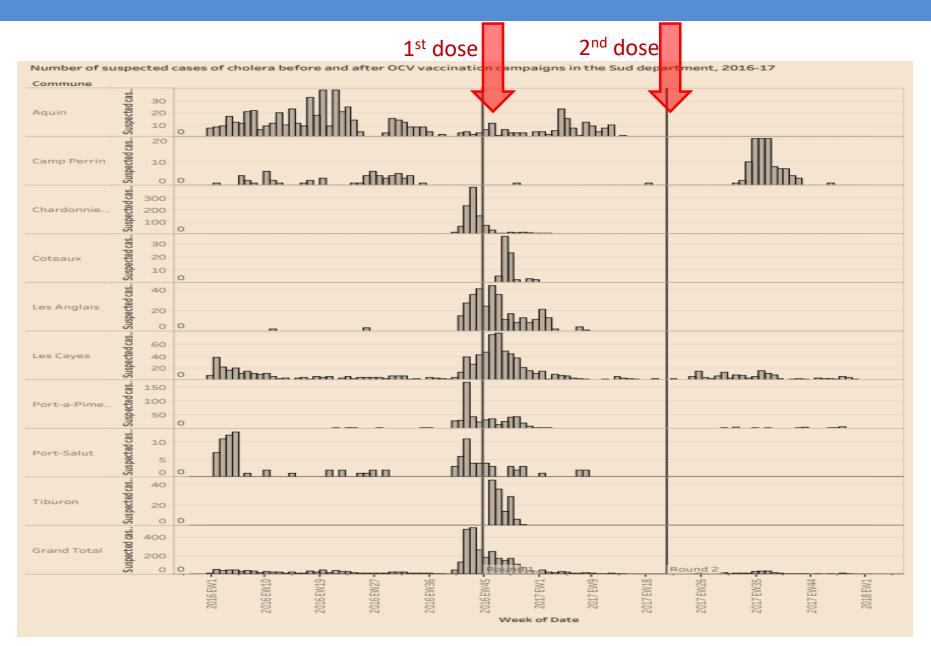
OCV Campaigns, Haiti, 2016-2018 (1)

Department	Commune	Communal Section	Urban/Rural	Target Population	2 doses	Vaccination coverage (2 doses)
	Anse					
	d'Hainault	All	Urban/Rural	37,616	21,255	57%
	Beaumont	All	Urban/Rural	32,635	17,270	53%
	Bonbon	All	Urban/Rural	8,900	5,688	64%
	Chambellan	All	Urban/Rural	27,342	18,979	69%
Grand'Anse	Dame Marie	All	Urban/Rural	40,041	26,480	66%
	Jérémie	All	Urban/Rural	138,802	90,245	65%
	Les Irois	All	Urban/Rural	24,155	17,882	74%
	Moron	All	Urban/Rural	32,197	19,732	61%
	Pestel	All	Urban/Rural	46,149	26,897	58%
	Aquin	All	Urban/Rural	107,695	70,633	66%
	Camp Perrin	All	Urban/Rural	46,547	39,029	84%
	Chardonnières	All	Urban/Rural	26,083	15,989	61%
	Coteaux	All	Urban/Rural	22,014	16,487	75%
Sud	Les Anglais	All	Urban/Rural	30,888	19,300	62%
	Les Cayes	All	Urban/Rural	156,762	110,318	70%
	Port-a-Piment	All	Urban/Rural	19,554	11,748	60%
	Port-Salut	All	Urban/Rural	19,736	16,017	81%
	Tiburon	All	Urban/Rural	20,437	11,366	56%

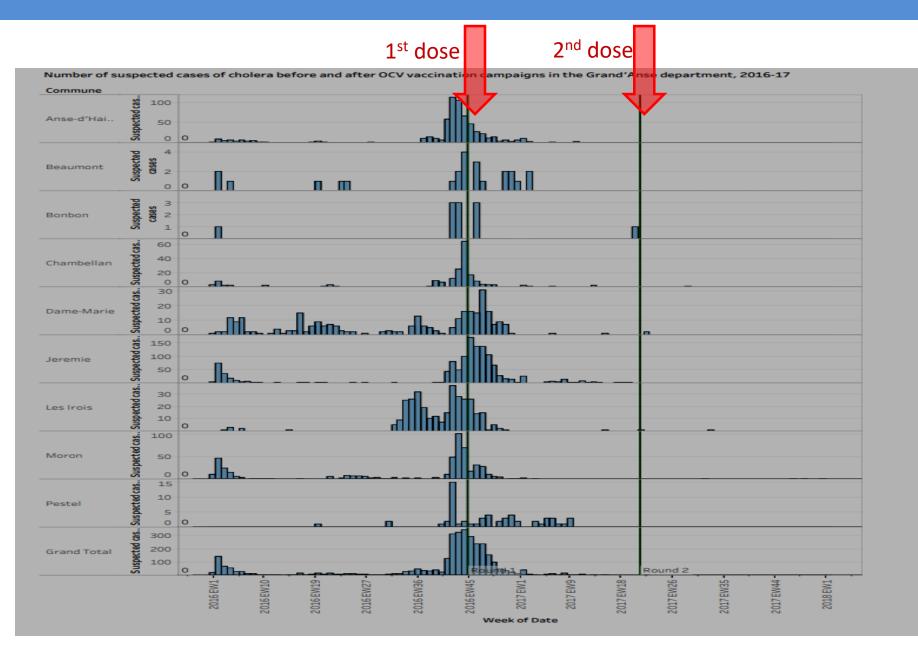
OCV Campaigns, Haiti, 2016-2018 (2)

Department	Commune	Communal Section	Urban/Rural	Target Population	2 doses	Vaccination coverage (2 doses)
Ouest	Port-au-Prince	National penitentiary	Urban	4,053	2,829	70%
Centre	Mirebalais	All	Urban/Rural	98,563	69,905	71%
Artibonite	Saint Michel de l'Attalaye	Bourg, 2e Camathe, 7e Marmont	Urban/Rural	62,241	59,537	96%
Total				1,002,410	687,586	69%

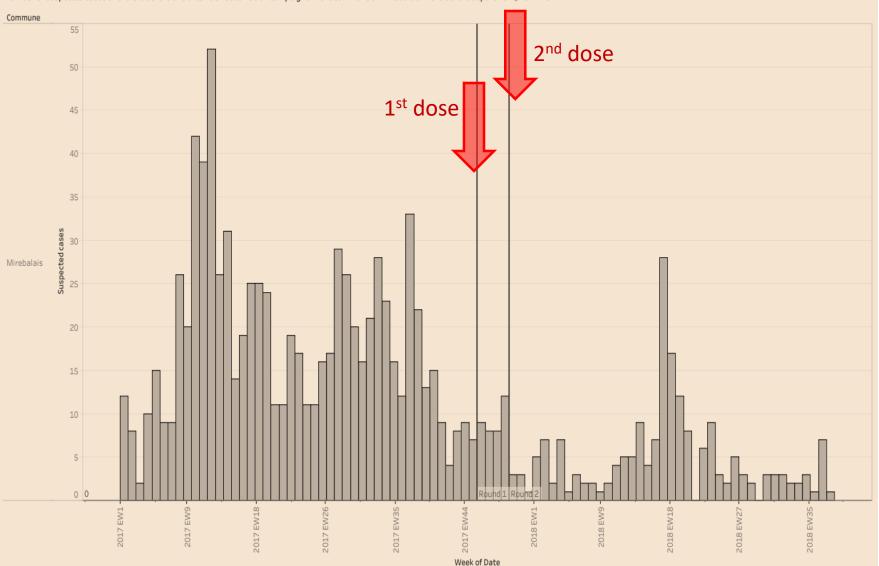
OCV Campaigns in Sud (Oct 2016, May 2017)



OCV Campaigns in Grand Anse (Oct 2016, May 2017)



OCV Campaigns in Mirebalais, Centre (Dec 2018)



Number of suspected cases of cholera before and after OCV vaccination campaigns in the commune of Mirebalais in the Centre department, 2017-18

Additional comments

Oral Vaccination against Cholera (OCV)

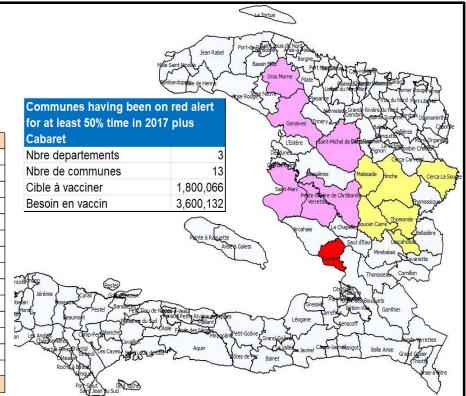
- Good acceptance by the Haitian population
- Successful experience in rural and urban areas
- Dispersion of targeted areas: logistical problems
- No study completed on vaccine immunological efficacy
- Low availability of vaccines: difficult second round
- Sub-optimal coordination between vaccination and WASH activities
- No important changes in hygiene and sanitation
- Calendar conflict with other usual vaccination campaign (Ex: Diphtaeria....etc.)

D-Perspectives 2018-2022

Perspectives

- 1. Long term plan 2019-2022: Vaccinate 2,400,000 people (4.8 M doses) across the country (in persistence zones/ hotspots)
 - Estimated Cost: US\$ 9.5 M
 - 3.6 M doses requested to GTFCC in 2018 (in process), to be implemented in 2019
 - Monitoring and Evaluation

Department	Communes to vaccinate	Population	< 1 an	Target population	OCV needs
Artibonite	Gonaïves	372,642	9,987	362,655	725,310
Artibonite	Gros Morne	162,822	4,364	158,458	316,917
Artibonite	Petite Rivière de L'Artibonite	178 <i>,</i> 559	4,785	173,774	347,547
Artibonite	Saint-Marc	278,853	7,473	271,380	542,759
Artibonite	Saint-Michel de L'Attalaye	100,000	2,680	97,320	194,640
Artibonite	Verrettes	151,444	4,059	147,385	294,771
Centre	Boucan Carré	58,594	1,570	57,024	114,047
Centre	Cerca La Source	59,121	1,584	57,537	115,073
Centre	Hinche	126,402	3,388	123,014	246,029
Centre	Lascahobas	47,974	1,286	46,688	93,377
Centre	Maïssade	61,641	1,652	59 <i>,</i> 989	119,978
Centre	Thomonde	64,714	1,734	62 <i>,</i> 980	125,959
Ouest	Cabaret	71,370	1,913	69,457	138,915
Other	Other	115,500	3,095	112,405	224,809
	Total	1,849,636	49,570	1,800,066	3,600,132



Perspectives

- 2. Increase of drinking water (chlorinated) in the communes to be vaccinated:
 - Equipment and water chlorination materials
 - Continuous monitoring of water quality
 - Source protection
 - Public policy for the provision of drinking water
- 3. Behavioral change promotion with hygiene, sanitation, health and home water treatment practices, as an extra to vaccination
 - Development, multiplication, dissemination of awareness messages
 - Provider Training on Behavior Change Communication (CCC)
 - Engagement of other state sectors, such as MENFP, MdE, MCFDF and MAST in the promotion process.
 - Engagement of the press and the media in the promotional dynamic.
 - Multisectoriel Coordination

Conclusion

- Currently, cholera activity is in its lowest level since the start of the outbreak
- Positive experience of OCV use in the fight against cholera: to continue.
- Lack of immunological efficacy studies: to be completed
- Resources needed to continue OCV campaigns, and to contribute to cholera elimination in Haiti
- Good momentum to eliminate cholera even before 2022

Thanks