
Goal: PUBLIC SAFETY**Desired Community Condition(s)**

The community is prepared to respond to emergencies, natural disasters, catastrophic acts and other events that threaten the health and safety of the public.

Residents feel safe in their neighborhoods, schools, and the community.

Program Strategy:BIODISEASE MANAGEMENT

56503

Public Health Protection from Diseases

Department: ENVIRONMENTAL HEALTH**Service Activities**

Bio-Disease Management

Strategy Purpose and Description

Services Delivered: Bio-Disease Management Division - provides a county-wide program to provide for public safety from bio-disease outbreaks whether by natural or deliberate means.

Services include: Conduct disease field surveillance, testing and control; community outreach and education; data management, research and strategy development related to Homeland Security.

Customers/Clients: Residents of Bernalillo County, wild animals, livestock, domestic pets, veterinarians who may treat animals and doctors who may treat humans with vector-borne disease, such as plague, tularemia, west nile virus, anthrax, etc..

State of Customer Conditions: Cases of plague, tularemia and west nile virus in animals were detected in FY03

Customer Conditions Being Addressed: Vector-borne diseases, which can cause illness and death in animal populations, including humans.

Changes and Key Initiatives

1. Perform disease testing for field samples collected and documented by the Bio-Disease Management staff.
2. Due to the human health threats experienced in New Mexico, Maricopa County AZ, EL Paso, TX, NYC and other municipalities, continue encephalitis surveillance.
3. Expand the Bio-Disease lab at the Montessa facility to enhance response capability.
4. Enhance disease surveillance capability to provide an Advance Warning System relative to the Bioterrorist threat.
5. Continue collaboration concerning Bioterrorism with pertinent agencies such as, CDC, Kirtland Airforce Base, NM Department of Health, NM Scientific Laboratory Division, UNM, B.C. Health Department and National Institute of Health.

Input Measure (\$000's)

2004	110	110 GENERAL FUND	345
2004	265	265 OPERATING GRANTS FUND	7
2005	110	110 GENERAL FUND	356
2005	265	265 OPERATING GRANTS FUND	20
2006	110	110 GENERAL FUND	394
2006	265	265 OPERATING GRANTS FUND	20

Strategy Outcome	Measure	Year	Project	Mid Year	Actual	Notes
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Reduce human contact to biological disease agents by developing prevention awareness and training, utilizing various methods of community outreach.	<i>Document the number of outreach events.</i>	2004	30 events			<i>Moved from SA 5643000, 2001 actual 21, 2002 projected 21, 2003 projected 21</i>
		2005	25 events	13 events	20 events	
		2006	25 events			

Strategy Outcome	Measure	Year	Project	Mid Year	Actual	Notes
Minimize the number of humans and animals infected by vector-borne diseases	<i># of human and animal cases</i>	2004	30			<i>2003 actual 33 human cases, 35 animal cases of West Nile disease</i>
		2005	30	20	25	<i>20 - West Nile Virus - human cases. The state is not tracking WNV animal cases this year. 25 - Includes a single human case of WNV in June, 2 dogs that contracted tularemia, and plague infection confirmed in a squirrel and a cat in the foothills.</i>
		2006	30			

Goal: PUBLIC SAFETY
Parent Program Strategy: BIODISEASE MANAGEMENT
Department: ENVIRONMENTAL HEALTH

Service Activity: Bio-Disease Management 5643000

Service Activity Purpose and Description

Services Delivered: Bio-Disease Management-provides a county-wide program to provide for public safety from bio-disease outbreaks whether by natural or deliberate means.

Services include: Disease field surveillance testing and control; community outreach and education; data management, research and strategy development.

Customers/Clients: The entire human and animal resident population of Bernalillo County (including first responders) who could be exposed to deadly biological diseases whether naturally existing, emerging or intentionally released (biological terrorism).

State of Customer Conditions: In FY04 there were 33 actual West Nile Virus cases in horses and 35 actual human cases. There were also 6 infections of Tularemia.

Customer Conditions Being Addressed: Due to the implementation of West Nile Virus (WNV) surveillance and control measures in FY04 by BDMD the incidence of WNV was one of the lowest in the State, even though approximately 1/3 of the States' human population resides in Bern. Co. Public Safety, concerning exposure to WNV was maximized in relation to allocated resources.

Changes and Key Initiatives

1. NM Scientific Laboratory is expanding disease testing services for a wider range of biological diseases to include those which have been designated by CDC as bio-terrorism agents. 2. Enhance disease surveillance capability to provide advance warning relative to the Bioterrorist threat. 3. Build, equip and staff a Disease presecreeneing laboratory. 4. Contine active participation with agencies such as CDC, Kirtland Airforce Base, NM Department of Health, NM Scientific Laboratory Division, UNM, B.C. Health Department, National Science Foundation, Georgetown Univ. and Johns Hopkins Univ. 5. Continue and expand the utlization of University funded student interns to assist with disease monitoring and data management.

Input Measure (\$000's)

2002	110	110 GENERAL FUND	344
2003	110	110 GENERAL FUND	291
2004	110	110 GENERAL FUND	345
2004	265	265 OPERATING GRANTS FUND	7
2005	110	110 GENERAL FUND	356
2005	265	265 OPERATING GRANTS FUND	20
2006	110	110 GENERAL FUND	394
2006	265	265 OPERATING GRANTS FUND	20

Strategic Accomplishments

FY02: Bio-Disease program staff utilizing the Animal Services facility to have more efficient access to disease-endemic areas.

FY02: Collaborate associations have been established with the University of New Mexico and Kirtland Airforce Base concerning Bio-Disease surveillance activities.

Collaboration with UNM resulted in the utilization of seven (7) student interns (paid by UNM), which increased West Nile Virus surveillance from approximately 4000 samples in FY02 to over 11,0000 in FY04. This allowed the control of West Nile Virus (mosquitos) in highly concentrated areas.

Output Measures	Year	Projected	Mid-Year	Actual	Notes
# adult and larval mosquito sites checked weekly	2001	tbd		155	
	2002	200		178	
	2003	200		200	

2004	200		249	
2005	220	250	250	<i>Regular larval habitats are monitored and treated as necessary using IPM methodology. New habitats are identified and added to the list of routine maintenance. Adults are monitored by trapping/surveillance protocol.</i>
2006	220			

Output Measures	Year	Projected	Mid-Year	Actual	Notes
# of mosquitos collected for identification and testing	2001	7191		8116	
	2002	8,000		8816	
	2003	8,000	7857	15054	<i>Numbers depend on staffing levels i.e. students and contractual.</i>
	2004	see notes		20,580	<i>Numbers depend on staffing levels i.e. students and contractual</i>
	2005	>10,000	30,974	30,974	<i>Numbers depend on staffing levels i.e. students and contractual. Trapping is a seasonal activity, no mosquitoes are trapped between October and early June. This output measures the mosquitoes captured and identified from early June until October.</i>
	2006	>10,000			

Output Measures	Year	Projected	Mid-Year	Actual	Notes
# of neighborhood plague control/tularemia measures implemented	2001	3		4	
	2002	5		11	
	2003	5	6	6	
	2004	5		6	
# of neighborhood plague/tularemia control measures implemented	2005	5	2	6	<i>This refers to follow-up investigations and treatment measures in response to suspected and/or confirmed cases of plague or tularemia, including trapping, site evaluation, burrow dusting, and dissemination of information to local residents.</i>
	2006	5			

Output Measures	Year	Projected	Mid-Year	Actual	Notes
# outreach and education events to educate the public about environmental diseases	2001	21		30	
# outreach and education events to educate the public about environmental diseases	2002	20		22	
	2003	32	22	33	
	2004	20	16	27	
# outreach and education events to educate the public about environmental diseases	2005	25	13	20	<i>This includes fish giveaways, information sessions and press coverage related to infectious disease.</i>

2006 20

Output Measures	Year	Projected	Mid-Year	Actual	Notes
# of Biological control measures implemented to prevent mosquito infestations	2005	300	100	400	<i>Mosquito fish are distributed to the general public to put in ponds to control mosquito larvae. High volume of calls and demand for fish in 2005 due to climate conditions.</i>
	2006	300			

Quality Measures	Year	Projected	Mid-Year	Actual	Notes
% of households contacted within 24 hours after notification of a plague or tularemia case	2001	95%		95%	
% of households contacted within 24 hours after notification of a plague or tularemia case	2002	95%		95%	
	2003	95%		95%	<i>Approximately 5% are not contacted within 24 hours due to absence of resident.</i>
	2004	95%		95%	<i>All households contacted. However, approximately 5% are not contacted within 24 hours due to absence of resident.</i>
% of households contacted within 24 hours after notification of a plague or tularemia case	2005	95%	100%	100%	<i>Approximately 5% are not contacted within 24 hours due to absence of resident.</i>
% of households contacted within 24 hours after notification of a plague or tularemia case	2006	95%			

Quality Measures	Year	Projected	Mid-Year	Actual	Notes
% of plague or tularemia sites treated within 24 hours of CDC notice	2001	100%		100%	
	2002	100%		100%	
	2003	100%		100%	
% of plague sites treated within 24 hours of CDC notice, given permission from site owner. Goal is 100%	2004	100%		100%	
% of plague or tularemia sites treated within 24 hours of CDC notice	2005	100%	100%	100%	
	2006	100%			

Quality Measures	Year	Projected	Mid-Year	Actual	Notes
% of mosquitos collected and tested	2005	50%	75%	75%	<p><i>FY04 6,175 tested/ 11054 collected</i></p> <p><i>FY05 2,478 mosquito pools (batches) tested / 3,301 mosquito pools collected.</i></p> <p><i>We will not have access to NSF grant funding in FY06, and should expect a significant decrease in testing rates.</i></p>
% of mosquitos collected that are tested	2006	30%			<p><i>Many species collected are not known to be common or significant vectors for encephalitis, and will not be tested. Only Culex species are thoroughly tested, although they are not the most frequently caught species.</i></p>