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Fourth Quarter 1972
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SALMONELLA

SURVEILLANCE

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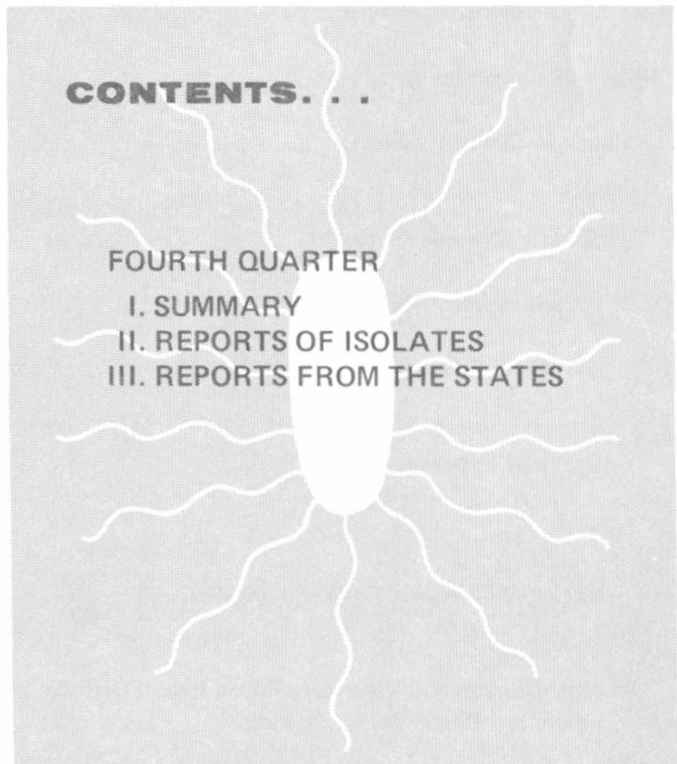
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FOURTH QUARTER

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PREFACE

Summarized in this report is information received from state and city health departments, university and hospital laboratories, the U.S. Food and Drug Administration, and other pertinent sources, domestic and foreign. Much of the information is preliminary. It is intended primarily for the use of those with responsibility for disease control activities. Anyone desiring to quote this report should contact the original investigator for confirmation and interpretation.

Contributions to the Surveillance Report are most welcome. Please address:

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*Through June 1973

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NOTE

The data contained in the tables and summarized in sections I and II deal only with isolates reported to CDC by state and other reference laboratories. Extrapolation from these data to aspects of the total incidence of salmonellosis in the United States should be made only with caution, and references to the data should be appropriately qualified.

I. SUMMARY

In the fourth quarter of 1972, 6,847 isolations of salmonella were reported from humans, an average of 527 isolations per week (Tables I, II, and V-A). This number represents a decrease of 60 (10.2%) from the weekly average during the third quarter of 1972 and an increase of 8 (1.5%) from the weekly average of the fourth quarter of 1971. The average number of human isolations reported per week for each month and for the quarter are provided below for the last 3 years.

	<u>1970</u>	<u>1971</u>	<u>1972</u>
October	644	562	607
November	523	562	534
December	432	452	437
Fourth quarter	525	519	527

Reports of 540 nonhuman isolates of salmonella were received during the fourth quarter of 1972 (Tables III, IV, and V-B).

II. REPORTS OF ISOLATIONS

The most frequently reported serotypes during the fourth quarter:

HUMAN				NONHUMAN		
Serotype	Number	Percent	Rank last quarter	Serotype	Number	Percent
<u>typhimurium*</u>	1612	23.5	1	<u>typhimurium*</u>	68	12.6
<u>newport</u>	665	9.7	2	<u>oranienburg</u>	62	11.5
<u>infantis</u>	420	6.1	4	<u>senftenberg</u>	31	5.7
<u>enteritidis</u>	400	5.8	3	<u>bredeney</u>	26	4.8
<u>heidelberg</u>	331	4.8	5	<u>minnesota</u>	20	3.7
<u>saint-paul</u>	323	4.7	6	<u>newport</u>	20	3.7
<u>javiana</u>	203	3.0	8	<u>montevideo</u>	17	3.1
<u>agona</u>	197	2.9	9	<u>infantis</u>	16	3.0
<u>san-diego</u>	187	2.7	21	<u>anatum</u>	15	2.8
<u>derby</u>	152	2.2	10	<u>derby</u>	14	2.6
<u>thompson</u>	152	2.2	7			
Total	4642	67.8		Total	289	53.5
TOTAL (all serotypes)	6847	100.0		TOTAL (all serotypes)	540	100.0
*Includes var. <u>copenhagen</u>	67	1.0		*Includes var. <u>copenhagen</u>	1	0.2

III. REPORTS FROM THE STATES

A. Reports of Salmonella Outbreaks Received During the Fourth Quarter, 1972

This table lists investigated outbreaks of salmonellosis reported to CDC from various sources. Definitions of cases and of numbers at risk are not uniform from report to report. This listing should be considered neither comprehensive nor representative of all outbreaks in the United States as most outbreaks are probably not reported to CDC.

State	Month of outbreak	Location	Serotype	Number					Mode of transmission	Comments
				Ill'	At risk	With positive cultures	Hospitalized	Deaths		
Colorado	August	Commerce City	<u>Salmonella B</u>	2	6	3	?	?	not identified	Family outbreak. Father, meat worker with asymptomatic infection.
Pennsylvania	"	Philadelphia	<u>S. san-diego</u>	3	?	82	3	0	?common source	Hospital outbreak.
Michigan	August-September	Ludington	<u>S. infantis</u>	7	?	7	5	0	not identified	
Texas	August-September	Austin	<u>S. minnesota</u>	4	16	7	0	0	Diet-All--proprietary protein supplement	Outbreak at school for mentally retarded children.
Colorado	September	Pueblo	<u>S. blockley</u>	3	3	3	?	0	person to person	Family outbreak.
Hawaii	"	Oahu	<u>S. newport</u>	42	200	16	1	0	Filipino food--goat, pork liver, pork and chicken	Positive cultures from 3 foods.
Illinois	"	Trenton	<u>S. infantis</u>	≥38	~300	20	10	1	bread dressing	Restaurant outbreak. Positive cultures from 9 food handlers; 4 asymptomatic.
New Jersey	"	Haddonfield	<u>S. chester</u>	8	37	10	2	0	roast beef from delicatessen	PTA covered dish supper. Positive culture from food handler.
Virginia	"	Fairfax Co.	<u>S. oranienburg</u>	2	8	4	2	0	turtle, ?person to person	Family outbreak.
Alaska	October	Kodiak	<u>S. san-diego</u>	14	20	8	0	0	?turkey	Restaurant outbreak.
California	"	Los Angeles	<u>S. typhi</u>	3	41	3	2	0	blood culture specimen	Laboratory technicians infected by specimen from patient.
Hawaii	"	Honolulu	<u>S. derby</u>	~75	400	2	0	0	not identified	Catered dinner.
Oklahoma	"	Shawnee	<u>S. blockley</u>	9	20	0	0	0	gravy for steak	Restaurant outbreak. Positive culture from batter used to thicken gravy.
Oregon	"	Portland	<u>S. enteritidis</u>	≥17	132	≥1	≥1	?	?food	Charter group returning from Acapulco.
New Jersey	"	Trenton	<u>S. agona, anatum, tennessee, infantis</u>	6	>200	11	0	0	head cheese--culture positive	Positive cultures from hog stomachs used as casings.
Louisiana	November	Hammond	<u>S. anatum</u>	168	842	8	2	0	?pork roast, cornbread dressing	School outbreak. Positive culture from pork. Cook ill 2 days earlier.
New York	"	Rochester	<u>Salmonella C₂</u>	2	?	2	2	1	not identified	Family outbreak. Fatal septicemia in 16-year-old boy.
"	"	"	<u>Salmonella D</u>	1	?	2	2	1	person to person	Fatal case in neonate. Mother had asymptomatic infection.
Texas	"	Austin	<u>S. newport, derby</u>	≥191	454	75	≥14	0	beans, beef--culture positive	Football pregame barbecue.
Washington	"	Spokane	<u>S. typhimurium</u>	240	500	20	?	?	?improperly cooked pudding	Outbreak at junior high school.

TABLE I. COMMON SALMONELLAE REPORTED FROM HUMAN SOURCES, FOURTH QUARTER, 1972

SEROTYPE	GEOGRAPHIC DIVISION AND REPORTING CENTER																															
	NEW ENGLAND					MIDDLE ATLANTIC					EAST NORTH CENTRAL					WEST NORTH CENTRAL					SOUTH ATLANTIC											
	ME	NH	VT	MAS	RI	CON	NYA	NYB	NYC	NJ	PA	OHI	IND	ILL	MIC	WIS	MIN	IOW	MO	ND	SD	NEB	KAN	DEL	MD	DC	VA	WVA	NC	SC	GA	FLA
<i>anatum</i>	1			5		2		2	2	8	9	2		8	8	6			2				1								7	15
<i>bareilly</i>	1					2				1							1		1				1		1		1			1	3	
<i>blockley</i>	1			4	2			4	6	7	14	3	2	4		1	1				1			1		3			2	2	2	4
<i>braenderup</i>					1			2	2	2	1				1	1	2					1		1						3		
<i>bredeney</i>				3		1		2	1	1	4			4	3			1							4					5	4	
<i>chester</i>				41		7				20	14		2				1													1		
<i>cholerae-suis v kun</i>															2	1														1	2	
<i>cubana</i>				2	1	1					1			2			1												1			
<i>derby</i>				1		1	1	6	5	6	6	2	2	10	4							2	1	7	1	3		2		10	27	
<i>enteritidis</i>				14	3	7	2	30	20	7	37	20	8	73	5	6	9	3	5				45	1	14	1	10	1	5	1	11	7
<i>give</i>				1				1			3				2																1	
<i>heidelberg</i>				5	3	8		10	5	20	25	4		20	16	9	7	1	7	2		3		17		5		3		13	19	
<i>indiana</i>								1	2	2	7	1	1	1	3								4		1				1	2	2	
<i>infantis</i>	1		1	21	3	8		3	6	17	24	9	9	32	20	10	3	3	4	1	1	26	1	14	1	8	1	13		8	21	
<i>java</i>				3		3		1	2	1	5			11		3	2	1				2							1	5	5	
<i>javana</i>										1		1	2					1				3	1	2						12	60	
<i>litchfield</i>				1	1	1		4	1	4	4		1	4	1											1				2	4	
<i>livingstone</i>																														1		
<i>manhattan</i>			1	2		2				1	2	2		9				1				4		1				2	1	1	1	
<i>miami</i>						1						1																		4	17	
<i>mississippi</i>																																
<i>montevideo</i>				6		2		6	3	2	3			7	2		2	2			1	2		2				1	4	3		
<i>muenchen</i>				13		1			2	2	9			7	1	2	3					1	1	1		3		4	1	4	6	
<i>newington</i>				1						1				1										1						1		
<i>newport</i>				8		7		11	10	14	24	8	2	16	9	7	2	5	14	1	2	4		12		5	1	7	4	25	91	
<i>oranienburg</i>				1		4	1	1		3	10	4		3	2	2						1		1		2		2	1	5	8	
<i>panama</i>						1		1	1		4	2				3	1								1			1		1		
<i>paratyphi B</i>				2				3	2			9	5		6									1		5		3	3		1	
<i>reading</i>				1						2				1									1		2	5						
<i>saint-paul</i>	2			7		4		12	8	12	16	7		12	14	11	1			1		2	1	22		7		15	1	8	45	
<i>san-diego</i>				11				1		1	150			3	2							1	1	1				2		1	5	8
<i>schwarzengrund</i>				1						1	1			1	2									1				1		1		
<i>senftenberg</i>						1		2	2	2	7	1		2	3		1	1					6		9		2		1		6	
<i>tennessee</i>										2	1												1									
<i>thompson</i>	2			14		4		4		7	11		2	14	4	2	3	2			2					5		1		7	4	
<i>typhi</i>				6		2	1	3	4	1	1	3	1	5	1									5			2	2	2	2	3	3
<i>typhimurium</i>	2	1	1	52	8	51		37	31	86	83	33	37	82	33	96	27	28	25	6	9	29	6	30	4	44		21	2	41	92	
<i>typhimurium v cop</i>				2		5				7					9														1			
<i>weltevreden</i>										1					2															1		
<i>worthington</i>						1									2									1					1			
TOTAL	10	1	3	228	22	127	5	147	116	239	478	111	73	336	154	159	66	48	77	11	16	-	134	15	155	7	107	10	89	23	194	465
ALL OTHER*	1	15	-	15	12	15	73	12	24	30	88	5	2	40	28	19	6	6	5	-	-	14	6	5	15	33	6	2	27	4	18	36
TOTAL	11	16	3	243	34	142	78	159	140	269	566	116	75	376	182	178	72	54	82	11	16	14	140	20	170	40	113	12	116	27	212	501

Note: NYA—New York, Albany; NYB—Beth Israel Hospital; NYC—New York City.

Beth Israel Hospital is a reference laboratory and this quarter serotyped a total of 230 cultures.

*See Table II.

TABLE I - Continued

GEOGRAPHIC DIVISION AND REPORTING CENTER																				TOTAL	% OF TOTAL	CUMULATIVE TOTAL	% OF CUMULATIVE TOTAL	SEROTYPE	
EAST S. CENTRAL				WEST S. CENTRAL				MOUNTAIN						PACIFIC											
KY	TEN	ALA	MIS	ARK	LA	OKL	TEX	MON	IDA	WYO	COL	NM	ARI	UTA	NEV	WAS	ORE	CAL	ALK	HAW					
	1		1	1	15	2	8						6	1		4		15		2	134	2.0	365	1.4	<i>anatum</i>
		4			1											1				1	19	0.3	76	0.3	<i>bareilly</i>
		1			2		4				2			1				8			85	1.2	436	1.7	<i>blockley</i>
					2		2											2		1	25	0.4	125	0.5	<i>braenderup</i>
					11		5						1					4		3	57	0.8	205	0.8	<i>bredeney</i>
1	1						1										1	2			90	1.3	131	0.5	<i>chester</i>
						1	1											4			8	0.1	24	0.1	<i>cholerae-suis v kun</i>
1			1		2	1	20						2	2				18		8	15	0.2	63	0.2	<i>cubana</i>
1	4	1	3	3	3	3	5	1	2		5					3	10	12	1	1	152	2.2	607	2.4	<i>derby</i>
																					400	5.8	1,655	6.5	<i>enteritidis</i>
4	5	1		1	8	2	5						1			1	1	3		1	30	0.4	94	0.4	<i>give</i>
					15	2	31						15	1		5	5	34		5	331	4.8	1,396	5.5	<i>heidelberg</i>
2	10	3		2	18	2	25		3		4		16	3		9	3	42		9	28	0.4	154	0.6	<i>indiana</i>
3	13	7	1	6	6			1			1							16	1		420	6.1	1,608	6.3	<i>infantis</i>
																					94	1.4	435	1.7	<i>java</i>
	3	2	4	8	40	2	52		1				5								203	3.0	560	2.2	<i>javana</i>
					10		1														47	0.7	164	0.6	<i>litchfield</i>
1	9			1	1		4				1		1							4	11	0.2	51	0.2	<i>livingstone</i>
											1					1		17			64	0.9	308	1.2	<i>manhattan</i>
																					23	0.3	88	0.3	<i>miami</i>
	6	1	1		10		2														28	0.4	105	0.4	<i>mississippi</i>
	1	1			6		13				2		1	1		4		13			93	1.4	347	1.4	<i>montevideo</i>
	1	2	1		7	3	7				1		4					1			103	1.5	420	1.7	<i>muenchen</i>
											1		2			1		2			13	0.2	41	0.2	<i>newington</i>
2	12	6	8	12	47	4	192		1		9		21			4	4	53		1	665	9.7	2,140	8.4	<i>newport</i>
		3		8	4		26	1			1		3	1	1	1	1	5		2	108	1.6	595	2.3	<i>oranienburg</i>
1					1		1													55	84	1.2	224	0.9	<i>panama</i>
		1		1			4	1													59	0.9	197	0.8	<i>paratyphi B</i>
1	3		4		55		14				2		1			4	1	30			17	0.2	88	0.3	<i>reading</i>
																					323	4.7	995	3.9	<i>saint-paul</i>
			1			1	1				2							7	8		187	2.7	300	1.2	<i>san-diego</i>
				1							8										18	0.3	57	0.2	<i>schwarzengrund</i>
					5		10				1										83	1.2	212	0.8	<i>senftenberg</i>
					1		4				1										12	0.2	51	0.2	<i>tennessee</i>
	2		1		10	1	13				7					3	5	20		1	152	2.2	654	2.6	<i>thompson</i>
2			1	4	4	2	7		1				8			3	1	48		1	130	1.9	488	1.9	<i>typhi</i>
16	48	22	18	28	37	8	71	6	2		35		12	10		39	5	165		25	1,545	22.6	6,265	24.7	<i>typhimurium</i>
1	11			3	6		1	3			1		8		4						67	1.0	278	1.1	<i>typhimurium v cop</i>
	1																				24	0.4	112	0.4	<i>weltevreden</i>
	1												2								12	0.2	41	0.2	<i>worthington</i>
36	133	61	45	69	327	32	533	13	9	1	83	-	110	20	5	89	42	568	11	146	5,959	87.0	22,155	87.2	TOTAL
1	14	7	4	11	49	3	63	-	-	1	2	68	12	1	3	10	5	57	5	10	888		3,245		ALL OTHER*
37	147	68	49	80	376	35	596	13	9	2	85	68	122	21	8	99	47	625	16	156	6,847		25,400		TOTAL

TABLE III. COMMON SALMONELLAE REPORTED FROM NONHUMAN SOURCES, FOURTH QUARTER, 1972

SEROTYPE	DOMESTIC ANIMALS AND THEIR ENVIRONMENT							ANIMAL FEEDS			
	CHICKENS	TURKEYS	SWINE	CATTLE	HORSES	OTHER	SUBTOTAL	TANKAGE	VEGETABLE PROTEIN	OTHER	SUBTOTAL
<i>anatum</i>			2			2	4	6		2	8
<i>bareilly</i>							—			1	1
<i>blockley</i>							—				—
<i>braenderup</i>							—				—
<i>bredeney</i>							—	2		8	10
<i>chester</i>							—				—
<i>cholerae-suis v kun</i>							—				—
<i>cubana</i>							—	8		3	11
<i>derby</i>			5	1			6				—
<i>enteritidis</i>							—				—
<i>give</i>							—	2			2
<i>heidelberg</i>				6			6	2			2
<i>indiana</i>							—				—
<i>infantis</i>						6	6				—
<i>java</i>							—				—
<i>javiana</i>						4	4				—
<i>litchfield</i>							—				—
<i>livingstone</i>							—	2			2
<i>manhattan</i>					1		1				—
<i>miami</i>							—				—
<i>mississippi</i>							—				—
<i>montevideo</i>							—	2		5	7
<i>muenchen</i>				3			3			1	1
<i>newington</i>							—	4			4
<i>newport</i>				2		5	7	1		1	2
<i>oranienburg</i>							—	2		11	13
<i>panama</i>			2				2				—
<i>paratyphi B</i>			2				2				—
<i>reading</i>				1			1				—
<i>saint-paul</i>		1					1	1			1
<i>san-diego</i>		1					1				—
<i>schwarzengrund</i>	1	1					2	4			4
<i>senftenberg</i>	1						1	4		8	12
<i>tennessee</i>				1			1			1	1
<i>thompson</i>							—				—
<i>typhi</i>							—				—
<i>typhimurium</i>		2	1	42	2	6	53				—
<i>typhimurium v cop</i>				1			1				—
<i>weltevreden</i>							—				—
<i>worthington</i>	4						4			2	2
TOTAL	6	5	12	57	3	23	106	40	—	43	83
ALL OTHER*	15	1	11	16	—	9	52	24	—	32	56
TOTAL	21	6	23	73	3	32	158	64	—	75	139

*See Table IV.

TABLE III - Continued

WILD ANIMALS AND BIRDS	FISH, REPTILES, AND ENVIRONMENT	HUMAN DIETARY ITEMS						MISCELLANEOUS	TOTAL	CUMULATIVE TOTAL	SEROTYPE
		EGGS AND PRODUCTS	POULTRY	RED MEAT	DAIRY PRODUCTS	OTHER	SUBTOTAL				
2	1					1	1		15	72	<i>anatum</i>
	3					1	—		2	24	<i>bareilly</i>
1			2				1		1	11	<i>blockley</i>
							—		3	17	<i>braenderup</i>
							2	13	26	62	<i>bredeney</i>
							—		—	2	<i>chester</i>
							1		—	3	<i>cholerae-suis v kun</i>
					1		1	1	13	46	<i>cubana</i>
2	1					5	5	3	14	65	<i>derby</i>
							—		3	19	<i>enteritidis</i>
	1						—	5	8	29	<i>give</i>
	1						1		10	59	<i>heidelberg</i>
									—	3	<i>indiana</i>
	7					6	6	4	16	59	<i>infantis</i>
							—		7	35	<i>java</i>
	5					1	1	1	6	7	<i>javana</i>
	4						—		5	14	<i>litchfield</i>
							—		2	9	<i>livingstone</i>
							—		5	29	<i>manhattan</i>
							—		—	—	<i>miami</i>
	3				2	8	10	1	1	1	<i>mississippi</i>
	2			1			—	1	17	69	<i>montevideo</i>
1							—		8	25	<i>muenchen</i>
							—		4	6	<i>newington</i>
						4	5	3	20	78	<i>newport</i>
	5						42	2	62	94	<i>oranienburg</i>
1	2						—		2	4	<i>panama</i>
							—		5	18	<i>paratyphi B</i>
1	1					1	1		2	7	<i>reading</i>
						3	3		7	77	<i>saint-paul</i>
1							—		2	9	<i>san-diego</i>
							—	1	7	25	<i>schwarzengrund</i>
							15	3	31	88	<i>senftenberg</i>
	2	2					—		2	32	<i>tennessee</i>
							2		4	26	<i>thompson</i>
6	5				1		—	2	—	2	<i>typhi</i>
							1		67	284	<i>typhimurium</i>
							—		1	18	<i>typhimurium v cop</i>
1							—		—	2	<i>weltevreden</i>
							—		7	26	<i>worthington</i>
16	43	2	2	1	4	88	97	40	385	1,456	TOTAL
8	10	—	3	1	—	22	26	3	155	784	ALL OTHER*
24	53	2	5	2	4	110	123	43	540	2,240	TOTAL

TABLE IV. OTHER SALMONELLAE REPORTED FROM NONHUMAN SOURCES, FOURTH QUARTER, 1972

SEROTYPE	DOMESTIC ANIMALS AND THEIR ENVIRONMENT							ANIMAL FEEDS			
	CHICKENS	TURKEYS	SWINE	CATTLE	HORSES	OTHER	SUBTOTAL	TANKAGE	VEGETABLE PROTEIN	OTHER	SUBTOTAL
<i>adelaide</i>						3	3				—
<i>albany</i>							—				—
<i>amsterdam</i>							—			3	3
<i>arechavaleta</i>						1	1				—
<i>arkansas</i>							—			9	9
<i>binza</i>							—	2		2	4
<i>bornum</i>							—			1	1
<i>california</i>	8			2			10				—
<i>cholerae-suis</i>			11				11				—
<i>drypool</i>							—	10		1	11
<i>dublin</i>				12			12				—
<i>eimsbuettel</i>	2						2			1	1
<i>gaminara</i>						1	1				—
<i>haifa</i>							—				—
<i>johannesburg</i>							—				—
<i>kentucky</i>							—	9		2	11
<i>minnesota</i>							—				—
<i>molade</i>							—			12	12
<i>new-brunswick</i>							—				—
<i>oslo</i>							—				—
<i>poona</i>							—				—
<i>pullorum</i>	4						4				—
<i>rubislaw</i>						1	1				—
<i>siegburg</i>							—	1			1
<i>thomasville</i>							—			1	1
<i>urbana</i>						2	2				—
<i>usumbura</i>						1	1				—
<i>weslaco</i>							—				—
<i>westhampton</i>	1	1					2				—
TOTAL	15	1	11	14	—	9	50	22	—	32	54
NOT TYPED*	—	—	—	2	—	—	2	2	—	—	2
TOTAL	15	1	11	16	—	9	52	24	—	32	56

*See Table V-B.

TABLE IV - Continued

WILD ANIMALS AND BIRDS	FISH, REPTILES, AND ENVIRONMENT	HUMAN DIETARY ITEMS						MISCELLANEOUS	TOTAL	CUMULATIVE TOTAL	SEROTYPE
		EGGS AND PRODUCTS	POULTRY	RED MEAT	DAIRY PRODUCTS	OTHER	SUBTOTAL				
1							-	1	3	3	<i>adelaide</i>
							-		2	3	<i>albany</i>
							-		3	5	<i>amsterdam</i>
							-		1	2	<i>arechavaleta</i>
							-		9	9	<i>arkansas</i>
			3				-		4	18	<i>binza</i>
							-		1	3	<i>bornum</i>
							3		13	54	<i>california</i>
							-		11	49	<i>cholerae-suis</i>
							-		11	35	<i>drypool</i>
	1						-		12	24	<i>dublin</i>
	2						-		3	67	<i>eimsbuettel</i>
							-		1	1	<i>gaminara</i>
							-		1	1	<i>haifa</i>
							-		2	24	<i>johannesburg</i>
							-		11	41	<i>kentucky</i>
						20	20		20	24	<i>minnesota</i>
							-		12	13	<i>molade</i>
	1					1	1		1	2	<i>new-brunswick</i>
							-		1	5	<i>oslo</i>
	2						-		2	18	<i>poona</i>
	1						-		4	15	<i>pullorum</i>
5							-		2	4	<i>rubislaw</i>
							-		6	46	<i>siegburg</i>
							-		1	25	<i>thomasville</i>
	1						-		3	14	<i>urbana</i>
							-		1	1	<i>usumbura</i>
						1	1		1	1	<i>weslaco</i>
							-		2	3	<i>westhampton</i>
6	8	-	3	-	-	22	25	1	144	668	TOTAL
2	2	-	-	1	-	-	1	2	11	116	ALL OTHER*
8	10	-	3	1	-	22	26	3	155	784	TOTAL

TABLE V. SALMONELLAE REPORTED BY GROUP IDENTIFICATION ONLY
FOURTH QUARTER, 1972

A. HUMAN SOURCES

REPORTING CENTER	GROUP												TOTAL
	A	B	C	C1	C2	D	E	E1	E2	E4	G	UNK	
ALABAMA			1										1
ALASKA		5											5
ARKANSAS		2		2					1				5
CALIFORNIA		7				2							11
DISTRICT OF COLUMBIA	1	20			3	5							33
FLORIDA												2	2
GEORGIA		1											1
ILLINOIS		5										1	6
IOWA		1											1
LOUISIANA											1		1
MICHIGAN												4	4
NEBRASKA		10		1	1	2							14
NEVEDA		1	1										2
NEW HAMPSHIRE		8		2	1	1	2					1	15
NEW MEXICO		47		12	5	3						1	68
NEW YORK - A		23	6		2	5							73
NEW YORK - BI				1									1
NEW YORK - C		5			1	3							10
NORTH CAROLINA												1	1
OREGON				1						1		2	4
RHODE ISLAND		7	2				1				1		11
TEXAS					3								3
WASHINGTON												2	2
WISCONSIN		1			1			1				1	4
WYOMING		1											1
TOTAL	1	144	10	19	17	21	3	1	1	1	2	59	279

B. NONHUMAN SOURCES

SOURCES	GROUP												TOTAL	
	A	B	C	C1	C2	D	E	E1	E2	E4	G	UNK		
DOMESTIC ANIMALS AND THEIR ENVIRONMENT													2	2
ANIMAL FEEDS													2	2
WILD ANIMALS AND BIRDS		2												2
FISH, REPTILES, AND ENVIRONMENT		2												2
HUMAN DIETARY ITEMS													1	1
MISCELLANEOUS				1	1									2
TOTAL	-	4	-	1	1	-	-	-	-	-	-	-	5	11

**STATE EPIDEMIOLOGISTS AND
STATE LABORATORY DIRECTORS**

The State Epidemiologists are the key to all disease surveillance activities. They are responsible for collecting, interpreting, and transmitting data and epidemiologic information from their individual States. Their contributions to this report are gratefully acknowledged. In addition, valuable contributions are made by State Laboratory Directors; we are indebted to them for their valuable support.

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