

Last Name: Positions 1-14, First Name Positions 15-24, Address: positions 25-44, City: positions 45-58, State 59-60, Zip positions 61-65, WPhone 66-72, HPhone: 73-79																																																																															
Position																																																																															
Data																																																																															
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80
N	E	L	S	O	N									C	A	R	O	L						3	1	6		V	I	C	T	O	R	I	A		D	R	I	V	E		S	A	C	R	A	M	E	N	T	O						C	A	9	5	6	2	2	4	8	7	4	5	6	3	9	2	7	6	5	9	7	
S	M	I	T	H										T	R	A	C	Y						1	5	9	8		E	L	K		G	R	O	V	E		B	L	V	D	E	L	K		G	R	O	V	E						C	A	9	5	6	7	8	7	8	5	6	3	4	3	8	2	0	6	5	4	3		
E	B	E	R	H	E	A	R	T	-	T	H	O	M	C	H	A	R	L	E	N	E				2	8	6	5	7		C	A	S	T	R	O	H	I	L	L		B	L	S	O		S	A	N		F	R	A	N	C	I	S	C	A	9	4	7	6	5	9	8	7	5	0	3	4	7	3	6	5	2	0	9	
B	Y	R	N	R	E									P	A	T	R	I	C	I	A		A	3	0	1	1		F	A	L	L	S	W	O	O	D	G	L	E	N		F	A	L	L	S		C	H	U	R	C	H		V	A	2	2	0	4	4	4	4	4	7	6	7	8	3	6	4	2	7	6	5	0		

1. What problems can you find with this data layout?

2. How could you add a one character code to indicate the sex of each person?

3. This record is used to print mailing labels and the post office now requires a nine digit zip code. What will you do?