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An evaluation of the social and economic impacts of additions and improvements to rural road infrastructure on their surrounding communities

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TABLE : AST8/16 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

What do you think the greatest effects of the tarring of this road have been and what is important about this road improvement to you?

	No.	%
Decrease in travel time	31,3	29,8
Decrease in vehicle maintenance	21,3	20,2
Increase in mobility	20,8	19,8
Decrease in accidents	7	6,7
Decrease in transport costs	4,6	4,4
Use of the road all year round	4	3,8
Increase in environmental quality	3,8	3,6
Increase in business activity	3,5	3,3
Other (positive)	5,9	5,6
No effect	1,3	1,3
Other (neutral)	0,5	0,5
Other (negative)	1,3	1,3
No response	1	
TOTAL	106	100

TABLE : AST9 - STERKSPRUIT ROAD - TRAVEL PURPOSE STUDY

Since the road has been tarred have you experienced any cost savings?

	Driver		Passenger		Paying Passenger	
	No.	%	No.	%	No.	%
Road results in cost savings	56	94,9	5	31,3	1	3,2
Road has no cost savings	3	5,1	11	68,8	30	96,8
No response	—	—	—	—	—	—
TOTAL	59	100	16	100	31	100

TABLE : AST10/9 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

Since this road has been tarred have you experienced any cost saving and would you be prepared to pay towards the road improvement?

	Road Results in Cost Savings		Road has no Cost Savings	
	No.	%	No.	%
Prepared to pay	63	92,6	24	64,9
Not prepared to pay	5	7,4	13	35,1
No response	—	—	1	—
TOTAL	68	100	38	100

TABLE : AST12 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

Since this road has been tarred have you experienced any time savings?

	No.	%
Road results in time savings	98	96,1
Road results in no time savings	4	3,9
No response	4	—
TOTAL	106	100

TABLE : AST13 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

Since the road has been tarred do you think there has been an increase or decrease in accidents?

	No.	%
Increase in accidents	27	25,7
Decrease in accidents	25	23,8
No change	53	50,5
No response	1	—
TOTAL	106	100

TABLE : AST14.1 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

IF INCREASE IN ACCIDENTS [AST13] : In what type of accidents?

	No.	%
Animal	5,8	21,6
Human	3,3	12,3
Vehicle	17,8	66,0
TOTAL	27	100

TABLE : AST14.2 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

IF DECREASE IN ACCIDENTS [AST13] : In what type of accidents?

	No.	%
Animal	3	12
Human	2	8
Vehicle	20	80
TOTAL	25	100

TABLE : AST15 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

It is expected that roads reduce travel time, costs and accidents. What do you think the most important aspect is?

	No.	%
Reduced travel time	74	70,5
Reduced costs	27	25,7
Reduced accidents	4	3,8
No response	1	
TOTAL	106	100

TABLE : AST17 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

If the road was closed for ONE DAY/ONE WEEK/ONE MONTH/RAINY SEASON of the year would it inconvenience you? How would this inconvenience you?

	Inconvenienced For							
	Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Business	22	21,6	2	2	1	1		
Shopping	4	3,9	3	2,9	3	2,9		
Employment	14	13,7	3	2,9				
Health	1	1	3	2,9	2	2		
Education	4	3,9						
Inconvenience	13	12,7	9	8,8	4	3,9	1	1
Other	5	4,9	1	1	3	2,9	2	2
TOTAL	63	61,8	21	20,6	13	12,7	3	2,9

100 (98%) respondents are inconvenienced 2 (2%) respondents are not inconvenienced. No response = 4. N=106

TABLE : AST18 - STERKSPRUIT ROAD - TRAVEL PURPOSE SURVEY

Since the road has been upgraded do you think it saves you vehicle maintenance costs? [ASK DRIVERS ONLY]

	No.	%
Road results in vehicle maintenance savings	56	98,2
Road results in no vehicle maintenance savings	1	1,8
No response	2	
TOTAL	59	100

TABLE : ALRi - LIBODE ROAD - RESIDENT IMPACT SURVEY

Age

	New Road		Old Road	
	No.	%	No.	%
18 - 24	6	6,2	3	3,9
25 - 34	21	21,7	17	22,1
35 - 44	21	21,7	14	18,2
45 - 54	12	12,4	14	18,2
55 - 64	15	15,5	10	13
65+	22	22,7	19	24,7
No response	1		1	
TOTAL	98	100	78	100

TABLE : ALRii - LIBODE ROAD - RESIDENT IMPACT SURVEY

Sex

	New Road		Old Road	
	No.	%	No.	%
Male	34	35,4	25	32,1
Female	62	64,6	53	67,9
No response	2			
TOTAL	98	100	78	100

TABLE : ALRiii - LIBODE ROAD - RESIDENT IMPACT SURVEY

Family status or status in community

	New Road		Old Road	
	No.	%	No.	%
Headman	1	1,1	1	1,3
Sub headman	1	1,1	1	1,3
Headman wife	1	1,1	1	1,3
Business leader			1	1,3
Social leader	4	4,2	1	1,3
Father	27	28,4	17	21,8
Mother	58	61,1	51	65,4
Son	3	3,2	4	5,1
Daughter			1	1,3
No response	3			
TOTAL	98	100	78	100

TABLE : ALRv - LIBODE ROAD - RESIDENT IMPACT SURVEY

Zone

	New Road		Old Road	
	No.	%	No.	%
A	5	5,1		
AA			5	6,4
B	6	6,1		
BB			8	10,3
C	10	10,2		
D	4	4,1		
DD			19*	24,4
E			12	15,4
F			12	15,4
G			16	20,5
I	12	12,2		
L	6	6,1		
O	14	14,3		
P	5	5,1		
QR	18	18,4		
STU	11	11,2		
X	3	3,1		
Y	4	4,1		
Z			6*	7,7
	98	100	78	100

*The old road is split down further into the intermediate road in certain categories due to inherent differences between it and the old gravel road.

TABLE : ALR1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

How long have you been living here?

	New Road		Old Road	
	No.	%	No.	%
Respondents living in the area for less than 2 years	5	5,2	1	1,3
Respondents living in the area for more than 2 years	91	94,8	76	98,7
No response	2		1	
TOTAL	98	100	78	100

TABLE : ALR2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

What day to day activities take up most of your time

Activity	New Road		Old Road	
	No.	%	No.	%
Agriculture	45	48,9	54	71,
Money Making	3	3,3	7	9,2
Agriculture and money making	2	2,2	5	6,6
Household chores	14	15,2	4	5,3
Formal employment	9	9,8	3	3,9
Unemployed	19	20,7	3	3,9
No response	6		2	
	98	100	78	100

TABLE : ALR3 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF AGRICULTURAL ACTIVITY [ALR2] : Do you sell your produce?

	New Road		Old Road	
	No.	%	No.	%
Produce sold	23	48,9	15	25,4
Produce not sold	24	51,1	44	74,6
TOTAL	47	100	59	100

TABLE : ALR4.1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF PRODUCE IS SOLD [ALR3] : Where do you sell your produce?

Place	New Road No.	New Road %	Old Road No.	Old Road %
Home/village	17	73,9	14	93,3
Libode	3,5	15,2		
Ntlaza	2,5	10,8	1	6,7
TOTAL	23	100	15	100

TABLE : ALR4.2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF PRODUCE IS SOLD [ALR3] : Why do you sell your produce at this place?

Reasons	New Road Home/ Village No.	New Road Home/ Village %	New Road Towns No.	New Road Towns %	Old Road Home/ Village No.	Old Road Home/ Village %	Old Road Towns No.	Old Road Towns %
Good Market	8	47,1	6	100	5	35,7	1	100
Size of produce too small	7	41,2			6	42,9		
No trading licence	1	5,9			1	7,1		
Unable to sell at other places	1	5,9			2	14,3		
TOTAL	17	100	6	100	14	100	1	100

TABLE : ALR5 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF PRODUCT IS NOT SOLD [ALR3] : Why don't you sell your product?

	New Road No.	New Road %	Old Road No.	Old Road %
Production sufficient for self consumption only	18	78,3	34	79,1
Shortage of farming land	4	17,4	9	20,9
Other	1	4,3	-	
No response	1		1	
TOTAL	24	100	44	100

TABLE : ALR6 - LIBODE ROAD - RESIDENT IMPACT SURVEY

What effect has the building of this road had on your agricultural production?

	New Road				Old Road			
	Produce Sold		Produce Not Sold		Produce Sold		Produce Not Sold	
	No.	%	No.	%	No.	%	No.	%
Increase	13	56,5	4	16,7	4	26,7	2	4,7
No change	10	43,5	20	83,3	11	73,3	41	95,3
Decrease								
No response	—	—	—	—	—	—	1	—
TOTAL	23	100	24	100	15	100	44	100

TABLE : ALR7 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF INCREASE IN AGRICULTURAL PRODUCTION [ALR6] : Why has the building of this road had an effect on your agricultural production

Reason	New Road		Old Road	
	No.	%	No.	%
Greater ease of inputs	9,5	55,9	2	33,3
Greater access to markets	5,5	32,4		
Greater involvement with agricultural extension officers	1	5,9	3	50
Other	1	5,9	1	16,7
TOTAL	17	100	6	100

TABLE : ALR8 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Has the building of this road led to greater participation with agricultural extension officers?

	New Road		Old Road	
	No.	%	No.	%
Improved relations	17	37,8	15	33,3
No change	28	62,2	30	66,7
No response	2	—	14	—
TOTAL	47	100	59	100

TABLE : ALR9 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF SOME TYPE OF ACTIVITY/COTTAGE INDUSTRY/MONEY MAKING ACTIVITY [ALR2] : What is produced?

	New Road		Old Road	
	No.	%	No.	%
Alcoholic beverages	2	40	2	15,4
Clothes and sewing	2	40	2	15,4
Food, cigarettes and drinks	1	20	2	15,4
Handicraft			6	46,2
Paraffin			1	7,7
TOTAL	5	100	13	100

TABLE : ALR10/11.1- LIBODE ROAD - RESIDENT IMPACT SURVEY

Where is the product sold? [Is the product sold]*

	New Road		Old Road	
	No.	%	No.	%
Home/Village	2,5	50	8	61,5
Libode	1,5	30	1,5	11,5
Ntlaza	1	20		
Mgwenyana			2	15,6
Umtata			1,5	11,5
TOTAL	5	100	13	100

*All products produced are sold

TABLE : ALR11.2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Why do you sell your product at this place?

	New Road				Old Road			
	Home/ Village		Town		Home/ Village		Town	
	No.	%	No.	%	No.	%	No.	%
Good market	2,5	100	2,5	100	4	57,1	5	100
Other					3	42,9		
No response					1			
TOTAL	2,5	100	2,5	100	8	100	5	100

TABLE : ALR13 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Has the building of the road had any effect on the production of this product?

	New Road		Old Road	
	No.	%	No.	%
Increase	4	80	1	7,7
No change	1	20	12	92,3
Decrease	—	—	—	—
TOTAL	5	100	13	100

TABLE : ALR14 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF PRODUCT PRODUCTION HAS INCREASED [ALR13] : Why has the building of this road had an effect on your product production?

	New Road		Old Road	
Reason	No.	%	No.	%
Traffic increases have resulted in customer increases	2	50	1	100
Greater ease of inputs	2	50	—	—
TOTAL	4	100	1	100

TABLE : ALR15 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Were you or your family involved in some type of employment in the construction of this road?

	New Road		Old Road	
	No.	%	No.	%
Employed on the road	25	25,8	11	14,1
Not employed on the road	72	74,2	67	85,9
No response	1	—	—	—
TOTAL	98	100	78	100

TABLE : ALR16 - LIBODE ROAD - RESIDENT IMPACT SURVEY

If the opportunity arose would you or any member of your family like to be involved in the maintenance and upkeep of this road?

	New Road		Old Road	
	No.	%	No.	%
Want to be employed on the road	70	72,2	41	52,6
Do not want to be employed on the road	27	27,8	37	47,4
No response	1			
TOTAL	98	100	78	100

TABLE : ALR17 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Do you think there is more traffic this year than two years ago?

	New Road		Old Road	
	No.	%	No.	%
Increase in traffic perceived	96	99	70	94,6
No change in traffic is perceived	1	1	4	5,4
No response	1		4	
TOTAL	98	100	78	100

TABLE : ALR18 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF INCREASE IN TRAFFIC IS PERCEIVED [ALR17] : Why do you think there is this change

	New Road		Old Road	
Reason	No.	%	No.	%
Tarring of road	73,5	78,2	61,5	37,9
Tourism/through traffic	11	11,7	-	
Yearly use of road	2,5	2,7	4	5,7
Increase in safety	6	6,4	2,5	3,6
Increase in taxi movement	1	1,1	2	2,9
No response	2		-	
TOTAL	96	100	70	100

TABLE : ALR19 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Do you make more trips now than two years ago

	New Road		Old Road	
	No.	%		%
Increase in travel	66	75	19	25
No change in travel	22	25	57	75
No response	10		2	
TOTAL	98	100	78	100

TABLE : ALR20 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENT TRAVELS MORE [ALR19] : Why do you make more trips?

Reasons	New Road		Old Road		Total	
	No.	%	No.	%	No.	%
Personal reasons	7	10,6	2	11,8	9	10,6
Transport availability	22,5	34,1	6,5	38,2	29	34,9
Time savings	11,5	17,4	4,3	25,3	15,8	19
Cost savings	6,5	9,9	1,3	7,6	7,8	9,4
Comfort	9	13,6	1,3	7,6	10,3	12,4
Safety	5	7,6	0,5	2,9	5,5	6,6
Use of road all year	4,5	6,8	1,1	6,5	5,5	6,6
No response	-		2		2	
TOTAL	66	100	19	100	85	100

TABLE : ALR21 - LIBODE ROAD - RESIDENT IMPACT SURVEY

How often per month do you make the following trips?

	New Road	Intermediate Road	Old Road
Work	3,15	3,52	1,34
Social	1,56	1,00	0,84
Shopping	4,21	2,96	1,94
Religious	1,76	1,28	0,98
Education	0,72		
Health	2,70	1,49	1,25
Government	0,55	0,88	0,13
	N=70	N=25	N=68

TOTAL N=142

TABLE : ALR22.1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you?

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
Inconvenienced by road closure	94	95,9	14	58,3	33	62,3
Not inconvenienced by road closure	4	4,1	10	41,6	20	37,7
No response	—	—	1	—	—	—
TOTAL	98	100	25	100	53	100

TABLE : ALR22.2 (NEW ROAD) - LIBODE ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you? w would it inconvenience you?

	Inconvenienced for							
	Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Education	1,5	1,5						
Health	19,5	20	8,5	8,7	5	5,1		
Employment	7	7,1						
Mobility decrease								
Business decline	4	4,1	3	3,1				
Shopping	5	5,1	3	3,1	3	3,1		
Inconvenience	19	19,4	7	7,1	4	4,1	1	1
Other	2	2	1.5	1.5	—	—	—	—
TOTAL	58	59,2	23	23,5	12	12,2	1	1

94 (95.9%) of respondents are inconvenienced. 4 (4,1%) of respondents are not inconvenienced. N=98

TABLE : ALR22.2 (INTERMEDIATE ROAD) - LIBODE ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you? How would it inconvenience you?

	Inconvenienced for							
	Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Education								
Health					3	12,5	1	4,2
Employment	1	4,2						
Mobility decrease								
Business decline	1	4,2	2	8,3	2	8,3		
Shopping					2	8,3		
Inconvenience					1	4,2		
Other	—	—	—	—	1	4,2	—	—
TOTAL	2	8,3	2	8,3	9	37,5	1	4,2

14 (58,3%) of respondents are inconvenienced. 10 (41,6%) of respondents are not inconvenienced. No response = 1. N=25

TABLE : ALR22.2 (OLD ROAD) - LIBODE ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you? How would it inconvenience you?

	Inconvenienced for							
	Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Education	1,5	2,8						
Health	3	5,7			2	3,8	1	1,9
Employment	2	3,8			2	3,8		
Mobility decrease								
Business decline	1	1,9						
Shopping	0,5	0,9			8	15,1	1	1,9
Inconvenience	4	7,5	1	1,9	1	1,9	2	3,8
Other	1	1,9	—	—	2	3,8	—	—
TOTAL	13	24,5	1	1,9	15	28,3	4	7,5

33 (62,3%) of respondents are inconvenienced. 20 (37,7%) of respondents are not inconvenienced. N=53

TABLE : ALR23 - LIBODE ROAD - RESIDENT IMPACT SURVEY

How often do you travel to the following centres?

	New Road	Intermediate Road	Old Road
Umtata	3,10	2,26	1,61
Libode	6,92	5,80	4,65
Port St Johns	0,62	0,72	0,47
Lusikisiki	0,22	0,09	0,20
Ngqeleni	2,01	0,71	0,85
Tsomo	0,04	0,03	
	N=75	N=25	N=29

TOTAL N=149

TABLE : ALR24.1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Do you travel to Umtata?

	New Road No.	New Road %	Old Road No.	Old Road %
Respondents who travel to Umtata	69	88,5	65	84,4
Respondents who do not travel to Umtata	9	11,5	12	15,6
No response	20		1	
TOTAL	98	100	78	100

TABLE : ALR24.2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENT TRAVELS TO UMTATA [ALR24.1] : What is the most important purpose for travelling to Umtata?

	New Road No.	New Road %	Old Road No.	Old Road %
Work	4	5,8	10	15,4
Social	7	10,1	14	21,5
Shopping	34	49,3	24,5	37,7
Religious			2,5	3,8
Education	4	5,8	1	1,5
Health	14	20,3	10	15,4
Government	6	8,7	3	4,6
TOTAL	69	100	65	100

TABLE : ALR25 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENT TRAVELS TO UMTATA [ALR24.1] : Is this facility available in Libode?

	New Road No.	%	Old Road No.	%
Facility available locally	40	58	20	30,8
Facilities not available locally	28	42	45	69,2
TOTAL	68	100	65	100

TABLE : ALR26 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF FACILITIES ARE AVAILABLE IN LIBODE [ALR25] : Why do you travel to Umtata instead of using local facilities?

	New Road No.	%	Old Road No.	%
Facilities better in Umtata	16	48	13	65
Facilities cheaper in Umtata	12	30	1	5
Facilities cheaper and better in Umtata	12	30	6	30
TOTAL	40	100	20	100

TABLE : ALR27/29 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Has the newly built road between Libode and Mgwenyana had any effect on you and the community and what do you think the greatest effects of building this road have been? [Specify in detail]

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
Increase in Mobility	34,6	36,8	1,8	7,5	5,6	10,9
Use of road all year	11,5	12,2	3	12,5	3,3	6,5
Decrease in accidents	6,5	6,9	0,3	1,3	0,8	1,5
Decrease in travel time	5,6	6	1	4,1	0,5	1
Improved access	4,8	5,1	0,5	2,1	1,4	2,8
General improved impact	4,8	5,1				
Other (positive)	0 7	14,6	3	14,6	2,8	5,5
No effect	3,1	3,3	4,8	20,4	16,5	32,3
Other (neutral)	0,5	4,2		4,1		0,5
Other (negative)	1	1,1	0,3	1,3	4;4	8,6
Increase in accidents	2,9	3,1	2,4	10	1	2
Decrease in mobility	1,5	1,6	5,3	22,1	14,5	28,5
No response	4		1		2	
TOTAL	98	100	25	100	53	100

TABLE : ALR28 - LIBODE ROAD - RESIDENT IMPACT SURVEY

When this road was being built what did you expect would happen?

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
Increase in mobility	19	21	0		3	6
Increase in accidents	12,2	13	3	12,5	1	2
Decrease in Accidents	15,3	16,7	0		1	2
Nothing	10,5	11,4	1	4,2	7	14
Increase in population	6	6,5	0		0	
Increase in Business	4,2	4,5	0		0	
Use of road all year	4	4	0		0	
Increase in employment	3,8	4	0		1	2
Other (positive)	14,5	15,8	1	4,2	1	2
Old route to be tarred	0,5	0,5	17,5	73	34	66
Other (negative)	2	2,2	1,5	6,2	3	4
No response	6		1		2	
TOTAL	98	100	25	100	53	100

TABLE : ALR30.1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Did you move as a result of the building of this road?

	New Road		Old Road	
	No.	%	No.	%
Moved as a result of the road	10	10,4	1	1,3
Did not move	86	89,8	74	98,7
No response	2		3	
TOTAL	98	100	78	100

TABLE : ALR30.2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Perceived reasons why respondents moved

Reasons	New Road		Old Road	
	No.	%	No.	%
Transport advantages	7	87,5		
Other roadside advantages	1	12,5		
Other			1	100
No response	2			
TOTAL	10	100	1	100

TABLE : ALR31 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Since this road has been built do you think that there has been an increase in people into this area?

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
People have moved into area	62	63,3	7	31,8	11	22,4
People have not moved into area	36	36,7	15	68,2	38	77,6
No response			3		4	
TOTAL	98	100	25	100	53	100

TABLE : ALR32.1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF PEOPLE HAVE MOVED INTO THE AREA [ALR31] : What changes have occurred since these people have moved to your area?

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
Changes have occurred	28	48,3	4	80	3	33,3
No change has occurred	30	51,7	1	20	6	66,7
No response	4		2		2	
TOTAL	62	100	7	100	11	100

TABLE : ALR 32.2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF CHANGES HAVE OCCURRED [ALR32.1] : What changes have occurred since these people moved into your area?

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
Break down of law and order	12	42,9	1	25		
Improved law and order	3	10,7				
Population congestion	1	3,6	3	75	1	33,3
Social benefits	2	7,1			2	66,7
Education improvement	4	14,3				
Building activity	3	10,7				
Other	3	10,7				
TOTAL	28	100	4	100	3	100

TALLE : ALR33 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF CHANGES HAVE OCCURRED [ALR32.1] : Does this affect you or your family in any way?

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
Changes affect family	21	38,2			1	9,1
Changes do not affect family	34	61,8	7	100	10	90,9
No response	7					
TOTAL	62	100	7	100	11	100

TABLE : ALR34 - LIBODE ROAD - RESIDENT IMPACT STUDY

IF CHANGES AFFECT FAMILY [ALR33] : In what way does it affect your family?

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
Positive effect	8	42,1			1	100
Negative effect	11	57,9				
No response	2					
TOTAL	21	100	0	0	1	100

TABLE : ALR35 - LIBODE ROAD - RESIDENT IMPACT SURVEY

If you had a choice, where would you prefer to live?

	New Road		Intermediate Road		Old Road	
	No.	%	No.	%	No.	%
Respondents prefer to live alongside the road	90	91,8	9	37,5	18	30,8
Respondents prefer to live further away from the road	8	8,2	15	62,5	36	69,2
No response			1		1	
TOTAL	98	100	25	100	53	100

TABLE : ALR36.1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENTS PREFER TO LIVE ALONGSIDE THE ROAD [ALR35] : What is the reason for your choice?

Reasons	New Road No.	New Road %	Intermediate Road No.	Intermediate Road %	Old Road No.	Old Road %	Total No.	Total %
Mobility advantages	79	90,8	6	66,7	11,5	71,9	96,5	86,2
Health advantages	3	3,5			0,5	3,1	3,5	3,1
See no advantage in moving	1	1,2					1	0,9
Business/ employment advantages	1	1,2	3	33,3	1	6,3	5	4,5
Other	3	3,5			3	18,8	6	5,4
No response	3	———	—	———	———	———	3	———
TOTAL	90	100	9	100	16	100	115	100

TABLE : ALR36.2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENTS PREFER TO LIVE FURTHER AWAY FROM THE ROAD [ALR35] : What is the reason for your choice?

Reasons	New Road No.	New Road %	Intermediate Road No.	Intermediate Road %	Old Road No.	Old Road %
Problems with moving			4	26,7	15	44,1
Problems of roadside living	8	100	5	33,3	2	5,9
See no advantage in moving			6	40	15	44,1
Other					2	5,9
No response	—	———	—	———	2	———
TOTAL	8	100	15	100	36	100

TABLE : ALR37 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Are the people who live alongside the new road different to those who live a distance away from the road?

	New Road		Old Road	
	No.	%	No.	%
People are different	70	71,4	49	65,3
People are not different	28	28,6	26	34,7
No response	—	—	3	—
TOTAL	98	100	78	100

TABLE : ALR38 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF PEOPLE ARE DIFFERENT [ALR37] : In what way are the people who live alongside the new road different?

	New Road		Old Road	
	No.	%	No.	%
Mobility advantages	54,3	79,9	34	70,8
Travel time saving	3	4,4	2	4,2
Business advantages	2	2,9	2	4,2
Other advantages	8,7	12,8	10	20,8
No response	2	—	1	—
TOTAL	70	100	49	100

TABLE : ALR39 - LIBODE ROAD - RESIDENT IMPACT SURVEY

As a result of the building of this road have government services improved in the area?

	New Road		Old Road	
	No.	%	No.	%
Government services have improved	40	41,7	29	38,6
No change in government services	56	58,3	46	61,3
No response	2	—	3	—
TOTAL	98	100	78	100

TABLE : ALR40 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF GOVERNMENT SERVICES HAVE IMPROVED [ALR39] : What services have improved as a result of the building of the road?

Type of Service	New Road No.	New Road %	Old Road No.	Old Road %
Agricultural extension officers	8,8	30,2	13	46,4
Pension	13	34,2	1	3,6
Health	5,8	15,3	1,5	5,4
Education	0,8	2,1	5	17,9
Water	3,5	8,2	2,5	8,9
Public transport	5	13,2	1	3,6
Other	1	2,6	4	14,3
No response	2		1	
TOTAL	40	100	29	100

TABLE : ALR41 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Do you think that the building of the road has improved employment opportunities?

	New Road No.	New Road %	Old Road No.	Old Road %
Road has improved employment opportunities	43	45,3	31	40,8
Road has not changed employment opportunities	52	54,7	45	59,2
No response	3		2	
TOTAL	98	100	78	100

TABLE : ALR42 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF ROAD HAS IMPROVED EMPLOYMENT OPPORTUNITIES [ALR41] : Why do you feel this way?

	New Road No.	%	Old Road No.	%
Construction jobs	18	41	23	76,7
Permanent jobs available	18	46,2	5	16,7
Transport jobs	1	2,6	1	3,3
Access to jobs increased (migration)	4	10,3	1	3,3
No response	4		1	
TOTAL	43	100	31	100

TABLE : ALR43.1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Was the community consulted during the planning and construction of this road?

	New Road No.	%	Old Road No.	%
Residents involved in some form of participation	38	40,9	29	37,2
Residents not involved in public participation	55	59,1	49	62,8
No response	5			
TOTAL	98	100	78	100

TABLE : ALR 43.2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Forms of public participation

	New Road No.	%	Old Road No.	%
Headman	12	34,3	16,5	56,9
Meeting	9	25,7	1	3,5
Public broadcast	2	5,7	1,5	5,2
Informal	12	34,3	2	6,9
No response	3		8	27,6
TOTAL	38	100	29	100

TOTAL : ALR45 - LIBODE ROAD - RESIDENT IMPACT SURVEY

In comparison to other price increases do you think transport costs have been reduced since the building of this road?

	New Road		Old Road	
	No.	%	No.	%
No change in transport costs	74	78,7	70	90,9
Decrease in transport costs	20	21,3	7	9,1
No response	4		1	
TOTAL	98	100	78	100

TABLE : ALR46 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Do you think travel time has been reduced since the road has been built?

	New Road		Old Road	
	No.	%	No.	%
Decrease in travel time	87	89,7	50	64,9
No change in travel time	10	10,3	27	35,1
No response	1		1	
TOTAL	98	100	78	100

TABLE : ALR47 - LIBODE ROAD - RESIDENT IMPACT SURVEY

What effect has the building of this road had on accidents?

	New Road		Old Road	
	No.	%	No.	%
Increased accidents	64	65,3	40	53,3
Decreased accidents	17	17,3	11	14,7
No change	17	17,3	24	32
No response	—		3	
TOTAL	98	100	78	100

TABLE : ALR48.1 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF INCREASED ACCIDENTS [ALR47] : What types of accidents have increased?

	New Road		Old Road	
	No.	%	No.	%
Animal	33	51,6	18	45
Human	17	26,6	11	27,5
Vehicle	14	21,9	11	27,5
No response	—	—	—	—
TOTAL	64	100	40	100

TABLE ALR48.2 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF DECREASED ACCIDENTS [ALR47] : What type of accidents have decreased?

	New Road		Old Road	
	No.	%	No.	%
Animal	6,7	39,4		
Human	2,7	15,8		
Vehicle	7,7	45,3	4	36,3
No response	—	—	7	63,6
TOTAL	17	100	11	100

TABLE : ALR49 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF ANIMAL ACCIDENTS HAVE INCREASED [ALR47.2] : Has this affected your agricultural income?

	New Road		Old Road	
	No.	%	No.	%
Increased animal accidents have an effect on agriculture	10	32,3		
Increased animal accidents have no effect on agriculture	21	67,7	18	100
No response	2	—	—	—
TOTAL	33	100	18	100

TABLE : ALR50 (NEW ROAD)- LIBODE ROAD - RESIDENT IMPACT SURVEY

Some people think that when a road is tarred it has a number of effects. What do you think the most important effect of tarring a road is and what do you think the least important effect of tarring a road is?

	New Road			
	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity	2	3,6	4	6,9
Improved business activity	1	1,8	5	8,6
Reduced travel time	28	50		
Decreased accidents	4	7,1	2	3,5
Reduced travel costs	1	1,8	7	12,1
Use of the road all year round	10	17,9	9	15,5
Bette. employment opportunities			7	12,1
Increase of population into the area	1	1,8	12	20,7
Greater access to medical facilities	8	14,3	4	6,9
Greater access to education facilities			3	5,2
Better government services	1	1,8	5	8 5
No response	42		40	
TOTAL	98	100	98	100

TABLE : ALR50 (INTERMEDIATE ROAD) - LIBODE ROAD - RESIDENT IMPACT SURVEY

Some people think that when a road is tarred it has a number of effects. What do you think the most important effect of tarring a road is and what do you think the least important effect of tarring a road is?

	Intermediate Road			
	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity	10	40	2	8
Improved business activity	2	8	1	4
Reduced travel time	4	16	2	8
Decreased accidents			2	8
Reduced travel costs			1	4
Use of the road all year round	4	16	4	12
Better employment opportunities	1	4	5	20
Increase of population into the area			4	20
Greater access to medical facilities	2	8	2	8
Greater access to education facilities	2	8	1	4
Better government services			1	4
No response	—	—	—	—
TOTAL	25	100	25	100

TABLE : ALR50 (OLD ROAD) - LIBODE ROAD - RESIDENT IMPACT SURVEY

Some people think that when a road is tarred it has a number of effects. What do you think the most important effect of tarring a road is and what do you think the least important effect of tarring a road is?

	Old Road			
	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity	1	3,7	1	3,6
Improved business activity	1	3,7	1	3,6
Reduced travel time	5	18,5	2	7,1
Decreased accidents	10	37	1	3,6
Reduced travel costs			3	10,7
Use of the road all year round	8	29,6	6	21,4
Better employment opportunities	1	3,7	3	10,7
Increase of population into the area			5	17,9
Greater access to medical facilities			3	10,7
Greater access to education facilities	1	3,7	2	7,1
Better government services			1	3,6
No response	26		25	
TOTAL	53	100	53	100

TABLE : ALR51 - LIBODE ROAD - RESIDENT IMPACT SURVEY

Do you feel that the old route is being adequately maintained?

	New Road		Old Road	
	No.	%	No.	%
Road adequately maintained	24	25	27	34,6
Route not adequately maintained	72	75	51	65,4
No response	2		—	
TOTAL	98	100	78	100

TABLE : ALR52 - LIBODE ROAD - RESIDENT IMPACT SURVEY

IF ROUTE IS BEING ADEQUATELY MAINTAINED [ALR50] : Why do you feel this way?

	New Road		Old Road	
	No.	%	No.	%
Road of less importance	10	41,7	2	8
Road still usable	2	8,3	18	72
Other	3	12,5	5	20
No response	9	37,5	2	--
TOTAL	24	100	27	100

TABLE : ASRi - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Age

	No.	%
18 - 24	26	9,5
25 - 34	39	14,2
35 - 44	65	23,6
45 - 54	46	16,7
55 - 64	48	17,5
65+	51	18,6
TOTAL	275	100

TABLE : ASRii - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Sex

	No.	%
Male	92	33,5
Female	183	66,5
TOTAL	275	100

TABLE : ASRi/ii - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Age and sex

	No.	%
Young male (18 - 44)	41	14,9
Young female (18 - 44)	89	32,4
Old male (44+)	51	18,5
Old female (44+)	94	34,2
TOTAL	275	100

TABLE : ASRiii - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Family status or status in community

	No.	%
Headman		
Sub headman	1	0,4
Headman wife	1	0,4
Business leader	8	3
Social leader	1	0,4
Father	66	24,5
Mother	150	55,8
Son	14	5,2
Daughter	16	5,9
Single	12	4,5
No response	6	
TOTAL	275	100

TABLE : ASR v - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Zones

	No.	%
A	21	7,6
B	13	4,7
C	15	5,4
D	14	5,1
E	34	12,4
F	9	3,3
G	33	12
H	38	13,8
I	5	1,8
J	6	2,2
K	10	3,6
L	11	4
M	12	4,4
NO	18	6,5
P	14	5,1
Q	6	2,2
RS	16	5,8
TOTAL	275	100

TABLE : ASR1 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

How long have you been living here?

	No.	%
Respondents living in the area for less than two years	2	0,8
Respondents living in the area for more than 2 years	256	99,2
No response	17	
TOTAL	275	100

TABLE : ASR2 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

What day to day activities take up most of your time?

	Young Male		Young Female		Old Male		Old Female		Total	
	No.	%	No.	%	No.	%	No.	%	No.	%
Agriculture	9	24,3	14	17,3	12	25,5	18	21,2	53	21,2
Money making activity	4	10,8	10	12,3	3	6,4	5	5,9	22	8,8
Agriculture/ money making	1	2,7	2	2,5			4	4,7	7	2,8
Household Chores	2	5,4	40	49,4	5	10,6	44	51,8	91	36,4
Formal Employment	11	29,7	3	3,7	7	14,9	5	5,9	26	10,4
Unemployed	10	27	9	11,1	20	42,6	9	10,5	48	19,2
Student			3	3,7					3	1,2
No response	4		8		4		9		25	
TOTAL	41	100	89	100	51	100	84	100	275	100

TABLE : ASR3 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF AGRICULTURAL ACTIVITY [ASR2] : Do you sell your produce?

	No.	%
Produce sold	13	22
Produce not sold	46	78
No response	1	
TOTAL	60	100

TABLE ASR4.1 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF PRODUCE IS SOLD [ASR3] : Where do you sell your produce?

Place	No.	%
Home/village	12	92,3
Sterkspruit	1	7,7
TOTAL	13	100

TABLE ASR4.2 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF PRODUCE IS SOLD [ASR3] : Why do you sell your product at this place?

Reasons	Home/Village		Town	
Good market	3	25	1	100
Size of produce too small	7	58,3		
Unable to sell at other places	2	16,7		
TOTAL	12	100	1	100

TABLE : ASR5 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF PRODUCE IS NOT SOLD [ASR3] : Why don't you sell your produce?

Reason	No.	%
Production sufficient for self consumption only	25	58,8
Shortage of farming land	4	9,1
Inadequacy of farming land	12	27,3
No market to sell produce	3	6,8
No response	2	———
TOTAL	46	100

TABLE : ASR6/7 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

What effect has the tarring of this road had on your agricultural production? [Why has the tarring of this road had an effect on your agricultural production?]

	Produce Sold		Produce Not Sold	
	No.	%	No.	%
Increase	1*	7,7	-	
No change	12	92,3	44	97,8
Decrease	-		2	2,2
No response	—	———	—	———
TOTAL	13	100	46	100

*An increase in produce sold due to ease of inputs.

A decrease in produce not sold due to increased animal accidents.

TABLE : ASR8 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Has the tarring of this road led to greater participation with agricultural extension officers?

	No.	%
Greater participation	2	3,4
No change in participation	42	71,2
No response	15	25,4
TOTAL	59	100

TABLE : ASR9 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF SOME TYPE OF ACTIVITY/COTTAGE INDUSTRY/MONEY MAKING ACTIVITY ASK [ASR2] : What is produced?

Type of Product	No.	%
Alcohol & beverages	10	34,5
Clothes & sewing	5	17,2
Food, Cigarettes & Drinks	6	20,7
Handicraft	2	6,9
Paraffin	2	6,9
Water & ice	4	13,8
TOTAL	29	100

TABLE : ASR10/11.1 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Where is the product sold? [Is the product sold]

Place	No.	%
Home/village	25	86,2
Sterkspruit	4	13,8
TOTAL	29	100

*All products produced are sold

TABLE : ASR11.2 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Why do you sell your product at this place?

	Home/Village		Town	
	No.	%	No.	%
Good market	11	45,8	1	33,3
Product not easily transportable	7	29,2		
Unable to sell at other places	3	12,5		
Other	3	12,5	2	66,7
No response	1		1	
TOTAL	25	100	4	100

TABLE : ASR13 - STERKSPRUIT ROAL - RESIDENT IMPACT SURVEY

Has the tarring of the road had any effect on the production of this product?

	No.	%
Increase	4	13,8
No change	25	86,2
Decrease	—	—
TOTAL	29	100

TABLE : ASR14 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF PRODUCT PRODUCTION HAS INCREASED [ASR13] : Why has the tarring of this road had an effect on your product production?

	No.	%
Traffic increases have resulted in customer increases and greater mobility	3	75
Greater ease of inputs	1	25
TOTAL	4	100

TABLE : ASR15 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Were you or your family involved in some type of employment when this road was being tarred?

	No.	%
Employed on the road	33	12
Not employed on the road	242	88
TOTAL	275	100

TABLE : ASR16 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

If the opportunity arose would you or any member of your family like to be involved in the maintenance and upkeep of this road?

	No.	%
Want to be employed on the road	142	51,6
Do not want to be employed on the road	133	48,4
TOTAL	275	100

TABLE : ASR17 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Do you think there is more traffic this year than two years ago?

	No.	%
Increase in traffic perceived	245	93,5
No increase in traffic perceived	17	6,5
No response	13	
TOTAL	275	100

TABLE : ASR18 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF INCREASE IN TRAFFIC IS PERCEIVED [ASR17] : Why do you think there is this change?

	No.	%
Tarring of road	131	56,5
Increase in mobility	25,5	11
Tourism & through traffic	20	8,6
Increase in safety	18,8	8,1
Decrease in travel time	10	4,3
Yearly use of the road	6	2,6
Increase in taxi movement	3,5	1,5
No response	13	
Other	17,2	7,4
TOTAL	245	100

TABLE : ASR19 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Do you make more trips now than two years ago?

	Young Males		Young Females		Old Males		Old Females	
	No.	%	No.	%	No.	%	No.	%
Increase in travel	19	50	46	55,4	11	22	31	37,8
No change in travel	19	50	37	44,6	38	78	51	62,2
No reponse	3		6		1		12	
TOTAL	41	100	89	100	51	100	94	100

TABLE : ASR20 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENT TRAVELS MORE [ASR18] : Why do you make more trips?

	Young Males		Young Females		Old Males		Old Females		Total	
	No.	%	No.	%	No.	%	No.	%	No.	%
Personal reasons	4	22,2	7	16,7	2	18,2	1.5	5,2	14,5	14,5
Transport availability	10,8	60	22	52,4	6	54,5	18	62,1	56,8	56,8
Time savings	1	5,6	2,5	6	-		1,5	5,2	5	5
Comfort	0,3	1,7	-		1	9,1	0,5	1,7	1,8	1,8
Safety	-		1,5	3,6	2	18,2	0,5	1,7	4	4
Use of road all year	0,5	2,8	-		-		2	6,9	2,5	2,5
Shopping	-		2	4,8	-		2,5	8,6	4,5	4,5
Other	1,3	7,2	7	16,6	-		2,5	8,6	10,8	10,3
No response	1		4		-		2			
TOTAL	19	100	46	100	11	100	31	100	100	100

TABLE : ASR21 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

How often per month do you make the following trips?

	Young Males	Young Females	Old Males	Old Females
Work	6,25	1,53	3,31	1.97
Social	2,32	1,32	0,80	1,01
Shopping	4,01	2,94	1,89	1,90
Religious	1,27	0,92	0,85	1,26
Education	0,81	1,26	0,08	
Health	0,92	1,18	1,63	1,40
Government	0,19	0,14	0,08	0,22
	N=37	N=51	N=35	N=81

TOTAL N=264

TABLE : ASR 22.1 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you?

	Young Male		Young Female		Old Male		Old Female	
	No.	%	No.	%	No.	%	No.	%
Inconvenienced by road closure	37	82,5	81	93,1	37	74	80	86
Not inconvenienced by road closure	3	7,5	6	6,9	13	26	13	14
No response	1	____	2	____	1	____	1	____
TOTAL	41	100	88	100	51	100	94	100

TABLE : ASR22.2 (YOUNG MALE) - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you? How would it inconvenience you?

	Inconvenienced for							
	Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Education								
Health	2,5	6,3	1	2,5	6	15		
Employment	8	20	2	5				
Mobility decrease	1	2,5						
Business decline	1	2,5	0,5	1,3				
Shopping	3,5	8,8	1,5	3,8	1	2,5		
Inconvenience	4	10	1	2,5	1	2,5		
Other	2	5			1	2,5		
TOTAL	22	55	6	15	9	22,5	0	0

37 (92,5%) of respondents are inconvenienced. 3 (7,5%) of respondents are not inconvenienced. No response = 1. N=41

TABLE : ASR22.2 (OLD MALE) - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you? How would it inconvenience you?

	Inconvenienced for Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Education	1,3	2,7						
Health	6,3	12,7	2	4	5,5	11		
Employment	4	8	1	2				
Mobility decrease	1	2					1	2
Business decline	1	2	0,5	1				
Shopping	1,8	1,7	0,5	1	5,5	11		
Inconvenience	3	6	1	2	1	2	1	2
Other								
TOTAL	18	36	5	10	12	24	2	4

37 (74%) of respondents are inconvenienced. 13 (26%) of respondents are not inconvenienced. N=50

TABLE : ASR22.2 (YOUNG FEMALE) - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you? How would it inconvenience you?

	Inconvenienced for Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Education	6,8	7,8						
Health	7,3	8,4			6,5	7,5		
Employment	6,5	7,5	1	1,1				
Mobility decrease	3	3,4	3	3,4	1	1,1		
Business decline	1	1,1	1	1,1	1	1,1		
Shopping	6,3	7,3	5	5,7	3	3,4		
Inconvenience	14,5	16,7	4	4,6	1	1,1		
Other	2,5	2,9	3	3,4	3,5	4	—	—
TOTAL	48	55,2	17	19,5	16	18,4	0	0

81 (93,1%) of respondents are inconvenienced. 6 (6,9%) of respondents are not inconvenienced. No response = 2. N=89

TABLE : ASR22.2 (OLD FEMALE) - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

If this road was closed for ONE DAY/ONE WEEK/ONE MONTH/ RAINY SEASON of the year would it inconvenience you? How would it inconvenience you?

	Inconvenienced for Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Education	1,5	1,6						
Health	10,2	10,9	11	11,8	6,5	7	1	1,1
Employment	4,2	4,5						
Mobility decrease	6	6,5	2	2,2				
Business decline	3	3,2						
Shopping	4,2	4,5	3	3,2	6	[illegible]		
Inconvenience	8	8,6	5	5,4	0,5	0,5		
Other	5	5,4	1	1,1	2	2,2	—	—
TOTAL	42	45,2	22	23,7	15	16,1	1	1,1

80 (86%) of respondents are inconvenienced. 13 (14%) of respondents are not inconvenienced. No response = 1. N=94

TABLE : ASR23 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

How often per month do you travel to the following centres?

	Young Males	Young Females	Old Males	Old Females
Umtata	0,23	0,07	0,16	0,13
Sterkspruit	9,64	5,73	5,81	4,22
Zastron	1,32	0,53	0,64	0,33
Lady Grey	0,96	0,61	1,26	0,49
Aliwal North	0,55	0,38	1,30	0,31
	N=35	N=83	N=47	N=84

TOTAL N=248

TABLE : ASR24.1 - STERKSPRUIT ROAD - RESIDENTS IMPACT SURVEY

Do you travel to Umtata?

	No.	%
Respondents who travel to Umtata	26	9,7
Respondents who do not travel to Umtata	242	90,3
No response	7	
TOTAL	275	100

TABLE ASR24.2 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENT TRAVELS TO UMTATA [ASR24.1] : What is the most important purpose for travelling to Umtata?

Reason	No.	%
Work	7	28
Social	7	28
Shopping		
Religious	2	8
Education		
Health	7	28
Government	2	8
No response	1	
TOTAL	26	100

TABLE : ASR25 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENT TRAVELS TO UMTATA [ASR24.1] : Is this facility available in Sterkspruit?

	No.	%
Facilities available in Sterkspruit	11	44
Facilities not available in Sterkspruit	14	56
No response	1	
TOTAL	26	100

TABLE : ASR26 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF FACILITIES ARE AVAILABLE IN STERKSPRUIT [ASR25] : Why do you travel to Umtata instead of using local facilities?

	No.	%
Facilities better in Umtata	5	55,6
Facilities not always available	2	22,2
Head Office	2	22,2
No response	2	
TOTAL	11	100

TABLE : ASR27/29 STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Has the tarring of the road in the Sterkspruit [Hershell] district had any effect on you and the community and what do you think the greatest effects of tarring this road have been? [Specify in detail]

	Young Male		Young Female		Old Male		Old Female	
	No.	%	No.	%	No.	%	No.	%
Increase in mobility	10,3	25,1	26,5	30,1	10,7	21,3	33,8	37,1
No effect	4,7	11,5	10,7	12,2	11,8	23,2	10,9	11,9
Decrease in travel time	6,6	16,1	9	10,2	5,4	10,5	8,6	9,5
Increase in environmental quality	0,5	1,2	5,6	6,6	1,2	2,4	4,7	5,2
Increase in safety	1,9	4,4	4,6	5,2	2,7	5,2	7,6	8,4
Increase in access to centres	1,7	4,1	4,2	4,8	2	3,9	2,6	2,9
Increase in health	1,5	3,7	2,8	3,3	1,3	2,6	6,1	6,7
Use of road all year round	2,2	5,4	1,6	1,8	1,8	3,6	3,4	3,7
Decrease in vehicle maintenance	2,6	6,6	2,3	2,6	2,2	4,3	2	2,2
Increase in comfort	0,7	1,7	0,5	0,6	2,5	4,9	1,9	2,1
Other	8,2	20,0	19,9	22,6	19,2	18,1	9,4	10,3
No response	____	____	1	____	1	____	3	____
TOTAL	41	100	89	100	51	100	94	100

TABLE : ASR27/29 STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Has the tarring of the road in the Sterkspruit [Hershell] district had any effect on you and the community and what do you think the greatest effects of tarring this road have been? [Specify in detail]

	Total No.	%
Increase in mobility	81,3	30
No effect	38,1	14,1
Decrease in travel time	29,6	10,9
Increase in environmental quality	12,2	4,5
Increase in safety	16,8	6,2
Increase in access to centres	10,5	3,9
Increase in health	11,8	4,4
Use of road all year round	9	3,3
Decrease in vehicle maintenance	9,3	3,4
Increase in comfort	5,6	2,1
Other (positive)	28,2	10,4
Other (negative)	18,5	6,8
No response	4	
Total	275	100

TABLE : ASR27/29 STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Has the tarring of the road in the Sterkspruit [Hershell] district had any effect on you and the community and what do you think the greatest effects of tarring this road have been? [Specify in detail]

	Total No.	%
Increase in mobility	81,3	30
No effect	38,1	14,1
Decrease in travel time	29,6	10,9
Increase in environmental quality	12,2	4,5
Increase in safety		6,2
Increase in access to centres	10,5	3,9
Increase in health	11,8	4,4
Use of road all year round	9	3,3
Decrease in vehicle maintenance	6,3	3,4
Increase in comfort	5,6	2,1
Other (positive)	28,2	10,4
Other (negative)	18,5	6,8
No response	4	
Total	275	100

TABLE : ASR28 STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

When this road was being constructed what did you expect would happen?

	Young Male		Young Female		Old Male		Old Female	
	No.	%	No.	%	No.	%	No.	%
Increase in mobility	3,3	8,1	8,8	10	3,5	7,1	11	12,4
No effect	3	7,3	24	27,3	12	24,5	19	21,3
Increase in safety	5,8	14,2	5,8	6,8	0,5	1	7,7	8,6
Increase in employment	7,1	17,1	17	19,3	12,8	26,2	13,3	15
Increase in government services	7,8	19,1	7	8	2,8	5,8	6,9	7,7
Increase in access roads	4	9,8	8	9,1	6,5	13,3	14,5	16,3
Other (positive)	8		15		10,1		13	
Other (negative)	2		2,3		,8		3,8	
No response	___	___	1	___	2	___	5	___
TOTAL	41	100	89	100	51	100	94	100

TABLE : ASR28 STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

When this road was being constructed what did you expect would happen?

	Total No.	%
Increase in mobility	26,6	10
No effect	58	21,7
Increase in safety	19,8	7,4
Increase in employment	50,2	18,8
Increase in government services	24,5	9,2
Increase in access roads	33	12,3
Other (positive)	46,1	17,3
Other (negative)	8,7	3,3
No response	8	
	275	100

TABLE : ASR30 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Did you move as a result of the tarring of this road? [Specify reason for moving]

	No.	%
Moved as a result of the road	4*	1,5
Did not move	271	98,5
TOTAL	275	100

*All respondents moved because of transport advantages.

TABLE : ASR31 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Since the road has been tarred do you think that there has been an increase of people into this area?

	No.	%
People have moved into area	133	49,6
People have not moved into area	134	50,4
No response	8	
TOTAL	275	100

TABLE : ASR32.1 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF PEOPLE HAVE MOVED INTO THE AREA [ASR31] : Have changes occurred since these people have moved to your area?

	No.	%
Changes have occurred	37	28
No changes have occurred	95	72
No response	1	
TOTAL	133	100

TABLE : ASR32.2 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF CHANGES HAVE OCCURRED [ASR32.1] : What changes have occurred since these people have moved to your area?

	No.	%
Breakdown of law and order	10	27
Population congestion	15	40,5
Social benefits	3	8,1
Business benefits	4	10,8
Mobility advantages	3	8,1
Social disadvantages	2	5,4
TOTAL	37	100

TABLE : ASR33 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF CHANGES HAVE OCCURRED [ASR32.1] : Does this affect you or your family in any way?

	No.	%
Changes affect family	14	37,8
Changes do not affect family	23	62,2
TOTAL	37	100

TABLE : ASR34 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF CHANGES AFFECT FAMILY [ASR33] : In what way does it affect your family?

	No.	%
Positive effect	6	42,9
Negative effect	8	57,1
TOTAL	14	100

TABLE : ASR35 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

If you had a choice where would you prefer to live?

	Young Male		Young Female		Old Male		Old Female	
	No.	%	No.	%	No.	%	No.	%
Respondents prefer to live alongside the road	37	90,2	73	83	29	56,9	63	67
Respondents prefer to live further away from the road	4	9,8	15	17	22	43,1	31	33
No response	—	—	1	—	—	—	—	—
TOTAL	41	100	89	100	51	100	94	100

TABLE : ASR35 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

If you had a choice where would you prefer to live?

	Young Male		Young Female		Old Male		Old Female	
	No.	%	No.	%	No.	%	No.	%
Respondents prefer to live alongside the road	37	90,2	73	83	29	56,9	63	67
Respondents prefer to live further away from the road	4	9,8	15	17	22	43,1	31	33
No response	—	—	1	—	—	—	—	—
TOTAL	41	100	89	100	51	100	94	100

TABLE : ASR36.1 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENTS PREFER TO LIVE ALONGSIDE THE ROAD [ASR35] :
What is the reason for your choice?

	Young Male		Young Female		Old Male		Old Female		Total	
Reason	No.	%	No.	%	No.	%	No.	%	No.	%
Mobility advantages	28	75,7	47	65,3	17	58,6	40	63,5	132	65,7
Health advantages	1	2,7	2	2,8	6	20,7	11	17,5	20	10
See no advantage in moving	2	5,4	4	5,6	1	3,5	1	1,6	8	4
Have always lived where they are	1	2,7	7	9,7	1	3,5	2	3,2	11	5,6
Travel times reduced	3	8,1	2	2,8	1	3,5	2	3,2	8	4
Use of road all year round			2	2,8			3	4,8	5	2,5
Convenience	1	2,7	2	2,8			1	1,6	4	2
Other	1	2,7	3	8,3	3	10,3	3	4,8	13	6,5
No response	—	—	1	—	—	—	—	—	1	—
TOTAL	37	100	73	100	29	100	63	100	202	100

TABLE : ASR36.2 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF RESPONDENTS PREFER TO LIVE FURTHER AWAY FROM THE ROAD [ASR35] : What is the reason for your choice?

Reason	Young Male No.	%	Young Female No.	%	Old Male No.	%	Old Female No.	%	Total No.	%
Problems with moving	1	25	9	60	4	18,2	14	45,2	28	38,9
*Problems of roadside living	2	50	1	6,7	9	40,9	10	32,2	22	30,6
See no advantage of moving	1	25	4	26,7	8	36,4	7	22,6	20	27,7
Have always lived where they are	___	___	1	6.7	1	4.5	___	___	2	2.8
TOTAL	4	100	15	100	22	100	31	100	72	100

*Problems of roadside living included excessive noise, accidents and other roadside disadvantages.

TABLE : ASR37 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Are the people who live alongside the road different to those who live a distance away from the road?

	No.	%
People are different	187	69,5
People are not different	82	30,5
No response	6	___
TOTAL	275	100

TABLE : ASR38 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF PEOPLE ARE DIFFERENT [ASR37] : In what way are the people who live alongside the road different?

	No.	%
Mobility advantages	94	50,5
Travel time savings	17	9,1
Do not have to use local access road	13	7
Greater access to health facilities	17	9,1
Greater ease of transporting goods	7	3,8
Greater access to shops	6	3,2
Other	32	17,2
No response	1	
TOTAL	187	100

TABLE : ASR39 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

As a result of the tarring of the road have government services improved in the area?

	No.	%
Government services have improved	92	33,6
No change in government services	182	66,4
No response	1	
TOTAL	275	100

TABLE : ASR40 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF GOVERNMENT SERVICES HAVE IMPROVED [ASR39] : What services have improved as a result of the tarring of the road?

Type of Service	No.	%
Water	38,7	43,2
Health	16,2	17,6
Education	9	9,8
Public transport	7,5	8,2
Agricultural extension officers	6	6,5
Administration of government	5,8	6,3
Other	7,8	8,4
TOTAL	92	100

TABLE : ASR41 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Do you think that the tarring of the road has improved employment opportunities?

	No.	%
Road has improved employment opportunities	57	20,8
Road has not improved employment opportunities	217	79,2
No response	1	
TOTAL	275	100

TABLE : ASR42 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF ROAD HAS IMPROVED EMPLOYMENT OPPORTUNITIES [ASR41] : Why do you feel this way?

	No.	%
Construction jobs	24	42,9
Permanent jobs available	15	26,8
Access to jobs increased (migration)	6	10,7
Road seen as part of developmental package of the Sterkspruit region which has created jobs	11	19,6
No response	1	
TOTAL	57	100

TABLE : ASR43.1 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Was the community consulted during the planning and construction of this road?

	No.	%
Residents involved in some form of participation	203	75,2
Residents not involved in public participation	67	24,8
No response	5	
TOTAL	275	100

TABLE : ASR43.2 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Forms of public participation.

	No.	%
Headman*	172	88,7
Meeting	11	5,7
Government officials	7	3,6
Informal	4	2,1
No response	9	
TOTAL	203	100

*118 (60,8% of all respondents who did participate) were informed by the Headman to pay a sum of money towards the cost of the construction of the road. 54 (27,8% of all respondents who did participate) were informed of the road by the Headman.

TABLE : ASR45 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

In comparison to other price increases do you think transport costs have been reduced since the tarring of this road?

	No.	%
No change in transport costs	223	93,2
Decrease in transport costs	17	6,8
No response	25	

TABLE : ASR46 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Do you think travel time has been reduced since the road has been tarred?

	No.	%
Decrease in travel time	246	93,5
No change in travel time	17	6,5
No response	12	
TOTAL	275	100

TABLE : ASR47 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

What effect has the tarring of this road had on accidents?

	No.	%
Increased accidents	105	39,9
Decreased accidents	88	33,5
No change	70	26,6
No response	12	
TOTAL	275	100

TABLE : ASR48.1 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF INCREASED ACCIDENTS [ASR47] : What types of accidents have increased?

	No.	%
Animal	39,5	38
Human	16	15,4
Vehicle	48,5	46,6
No response	1	
TOTAL	105	100

TABLE : ASR48.2 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF DECREASED ACCIDENTS [ASR47] : What type of accidents have decreased?

	No.	%
Animal	15	19,5
Human	6,5	8,4
Vehicle	55,5	72,1
No response	11	

TABLE : ASR49 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

IF ANIMAL ACCIDENTS HAVE INCREASED [ASR48.1] : Has this affected your agricultural income?

	No.	%
Increased animal accidents have negative effect on agriculture	13	33,3
Increased animal accidents have no effect on agriculture	26	66,7
No response	21	____
TOTAL	60	100

TABLE : ASR50 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Some people think that when a road is tarred it has a number of effects. What do you think the most important effect of tarring a road is and what do you think the least important effect of tarring a road is?

	Old Female			
	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity			9	10.1
Improved business activity	11	12.1	9	10.1
Reduced travel time	28	30.8	16	18
Decreased accidents	10	11	4	4.5
Reduced travel costs	1	1.1	7	7.9
Use of road all year round	16	17,6	14	15,7
Better employment opportunities	7	7.8	7	7.9
Increase of population into the area			17	19.1
Greater access to medical facilities	15	16.5	3	3,4
Greater access to education facilities	2	2.2	2	2,3
Better government services	1	1,1	1	1,1
No response	3		5	
TOTAL	94	100	94	100

TABLE : ASRAD - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Some people think that when a road is tarred it has a number of effects. What do you think the most important effect of tarring a road is and what do you think the least important effect of tarring a road is?

	Old Male			
	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity	1	2,1	2	4,3
Improved business activity	3	6,3		
Reduced travel time	17	35,4	4	8,5
Decreased accidents	6	12,5	5	10,6
Reduced travel costs	2	4,2	10	21,3
Use of road all year round	5	10,4	9	19,1
Better employment opportunities	3	6,3	8	17
Increase of population into the area	2	4,2	5	10,6
Greater access to medical facilities	7	14,6	2	4,3
Greater access to education facilities	1	2,1		
Better government services	1	2,1	2	4,3
No response	3		4	
TOTAL	51	100	51	100

TABLE : ASR50 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Some people think that when a road is tarred it has a number of effects. What do you think the most important effect of tarring a road is and what do you think the least important effect of tarring a road is?

	Young Male			
	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity	1	2,7	2	5,6
Improved business activity	1	2,7	1	2,8
Reduced travel time	19	51,4	2	5,6
Decreased accidents	2	5,4	3	8,3
Reduced travel costs	4	10,8	7	19,4
Use of road all year round	3	8,1	6	16,7
Better employment opportunities	2	5,4	6	16,7
Increase of population into the area	2	5,4	7	19,4
Greater access to medical facilities	2	5,4	2	5,6
Greater access to education facilities	1	2,7		
Better government services				
No response	4		5	
TOTAL	41	100	41	100

TABLE : ASR50 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Some people think that when a road is tarred it has a number of effects. What do you think the most important effect of tarring a road is and what do you think the least important effect of tarring a road is?

	Young Female			
	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity	1	1,2	5	6
Improved business activity	7	8,6	3	3,6
Reduced travel time	27	33,3	19	22,9
Decreased accidents	14	17,3	5	6
Reduced travel costs			13	15,7
Use of road all year round	11	13,6	13	15,7
Better employment opportunities	9	11,1	7	8,4
Increase of population into the area	1	1,2	13	15,7
Greater access to medical facilities	6	7,4	2	2,4
Greater access to education facilities	4	4,9	2	2,4
Better government services	1	1,2	1	1,2
No response	8		6	
TOTAL	89	100	89	100

TABLE : ASR50 - STERKSPRUIT ROAD - RESIDENT IMPACT SURVEY

Some people think that when a road is tarred it has a number of effects. What do you think the most important effect of tarring a road is and what do you think the least important effect of tarring a road is?

	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity	3	1,1	18	7,1
Improved business activity	22	8,4	13	5,1
Reduced travel time	91	34,6	41	16,1
Decreased accidents	32	12,2	17	6,7
Reduced travel costs	7	2,7	37	14,5
Use of road all year round	35	13,3	42	16,5
Better employment opportunities	21	8	28	11
Increase of population into the area	5	1,9	42	16,5
Greater access to medical facilities	30	11,4	7	2,7
Greater access to education facilities	7	2,7	6	2,4
Better government services	4	1,5	4	1,6
No response	12	100	275	100
TOTAL	94	100	94	100

TABLE : ALBi - LIBODE ROAD - BUSINESS IMPACT SURVEY

Zone location of business

	No.	%
A	9	40,9
AA	1*	4,5
C	1	4,5
D	1	4,5
DD	1*	4,5
G	1*	4,5
I	2	9,1
O	1	4,5
QR	1	4,5
STU	2	9,1
Y	1	4,5
Z	1*	4,5
TOTAL	22	100

* Businesses located along the old road

TABLE : ALBii - LIBODE ROAD - BUSINESS IMPACT SURVEY

Business position of respondent

	New Road		Old Road	
	No.	%	No.	%
Owner	9	50	4	100
Manager	9	50		
TOTAL	18	100	4	100

TABLE : ALRiii - LIBODE ROAD - BUSINESS IMPACT SURVEY

Business type

	New Road		Old Road	
	No.	%	No.	%
General dealer	9	50	2	50
Cafe/fast food	5	27,8	2	50
Retail/specialist	3	16,7		
Hotel	1	5,6		
TOTAL	18	100	4	100

TABLE : ALB1 - LIBODE ROAD - BUSINESS IMPACT SURVEY

How long have you been in this type of business?

	New Road No.	New Road %	Old Road No.	Old Road %
Business operating in the area for less than 2 years	4	23,5	2	50
Business operating in the area for more than 2 years	13	76,5	2	50
No response	1			
TOTAL	18	100	4	100

TABLE : ALB2 - LIBODE ROAD - BUSINESS IMPACT SURVEY

IF OWNER HAS BEEN IN BUSINESS LESS THAN 2 YEARS [ALB1] : What was your motivation for involvement in business?

	New Road No.	New Road %	Old Road No.	Old Road %
Roadside advantages	1	25		
Profit			1	50
Perceived need of area			1	50
No response	3	75		
TOTAL	4	100	2	100

TABLE : ALB3/4/5 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Have you moved your business location since the building of this road and what are the reasons thereof? [Where did you live 2 years ago and where do you live now?]

	New Road No.	New Road %	Old Road No.	Old Road %
Businesses which have moved since the building of the road	1*	5,9		
Businesses which have not moved since the building of the road	16	94,1	4	100
No response	1			
TOTAL	18	100	4	100

Business moved because of advantages of the road

TABLE : ALB6 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Since this road has been built do you think that people travel further to take advantage of your store/business?

	New Road No.	New Road %	Old Road No.	Old Road %
People travel further to take advantage of business	13	72,2	1	25
People do not travel further to take advantage of business	5	27,8	3	75
TOTAL	18	100	4	100

TABLE : ALB7/9 (NEW) - LIBODE ROAD - BUSINESS IMPACT SURVEY

Has the new tarred road between Libode and Mgwenyana had any effect on you and the community and what are the greates effects of tarring this road? [Specify in detail]

	No.	%
Increase in business activity	5	29,1
Increase in mobility	3	16,8
Increase in through traffic	2	13,5
Decrease in vehicle maintenance	1	4,9
Increase in employment	1	4,[illegible]
Use of the road all year round	0,5	3,9
Other (positive effect)	1,4	8,2
No effect	1	6,1
Other (negative effect)	1,1	6,5
Increased shopping at Umtata	1	6,3
No response	1	
TOTAL	18	100

TABLE : ALB7/9 (OLD) - LIBODE ROAD - BUSINESS IMPACT SURVEY

Has the new tarred road between Libode and Mgwenyana had any effect on you and the community and what are the greatest effects of tarring this road? [Specify in detail]

	No.	%
Use of road all year round	0,5	12,5
No effect	1,5	37,5
Decrease in business activity	1,5	37,5
Decrease in mobility	0,25	6,3
Decrease in access	0,25	6,3
TOTAL	4	100

TABLE : ALB8 (NEW) - LIBODE ROAD - BUSINESS IMPACT SURVEY

When this road was being constructed what did you expect would happen?

	No.	%
Increase in business activity	6	33,3
Increase in mobility	2	11,1
Increase in through traffic	2	11,1
Increase in employment	1,5	8,3
Other (positive effect)	2,5	13,9
Access roads to be improved	2	11,1
Other (negative effect)	2	11,1
TOTAL	18	100

TABLE : ALB8 (OLD) - LIBODE ROAD - BUSINESS IMPACT SURVEY

When this road was being constructed what did you expect would happen?

	No.	%
Increase in business activity	1	25
Old road to be tarred	2	50
No response	1	25
TOTAL	4	100

TABLE : ALB10 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Do you think the building of this road has had any economic effect in the region?

	New Road		Old Road	
	No.	%	No.	%
Road has an economic effect	11	61,1	2	50
Road has no economic effect	7	38,9	2	50
TOTAL	18	100	4	100

TABLE : ALB11 - LIBODE ROAD - BUSINESS IMPACT SURVEY

IF ROAD HAS AN ECONOMIC EFFECT [ALB10] : In what way does it have an economic effect?

	New Road		Old Road	
	No.	%	No.	%
Increase in shopping	3	27,3		
Decrease in vehicle maintenance	1,5	13,6		
Use of the road all year round	1	9,1	1	50
Increase in through traffic	1	9,1		
Other	1,5	13,6	1	50
No response	3	27,3	—	—
TOTAL	11	100	2	100

TABLE : ALB12 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Have government services improved in the area since this road has been built?

	New Road		Old Road	
	No.	%	No.	%
Government services have improved	9	56,3		
No change in government services	7	43,8	4	100
No response	2			
TOTAL	18	100	4	100

TABLE : ALB13 - LIBODE ROAD - BUSINESS IMPACT SURVEY

IF GOVERNMENT SERVICES HAVE IMPROVED [ALB12] : What kind of government services have improved?

	New Road		Old Road	
	No.	%	No.	%
Clinics and health	3	33,3		
Electricity	3	33,3		
Defence and police	1,5	16,7		
Water	1	11,1		
Agricultural extension officers	0,5	5,6		
TOTAL	9	100	0	0

TABLE : ALB14 - LIBODE ROAD - BUSINESS IMPACT SURVEY

From which town do you buy the majority of your stocks for your business?

	New Road		Old Road	
	No.	%	No.	%
Umtata	17	94,4	4	100
Kokstad	1	5,6	0	
TOTAL	18	100	4	100

TABLE : ALB15.1 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Has the frequency of your delivery service to your store improved?

	New Road		Old Road	
	No.	%	No.	%
Frequency of delivery has improved	16	94,1	0	0
No change in frequency of delivery	1	5,9	4	100
No response	1			
TOTAL	18	100	4	100

TABLE : ALB15.2 LIBODE ROAD - BUSINESS IMPACT SURVEY

Perceived reasons why delivery service frequency has improved?

	New Road		Old Road	
	No.	%	No.	%
Tarring of road	12	75		
Use of road all year round	2	12,5		
Travel time reduced	1,5	9,4		
Other	0,5	3,1		
TOTAL	16	100	0	0

TABLE : ALB15.3 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Perceived reasons why delivery service frequency has not changed

	New Road		Old Road	
	No.	%	No.	%
Old, untarred road hampers deliveries			3	75
No response	1	100	1	25
TOTAL	1	100	4	100

TABLE : ALB16.1 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Has the quality of your delivery service to your store improved?

	New Road		Old Road	
	No.	%	No.	%
Quality of delivery service has improved	14	93,3	0	0
No change in the quality of delivery service	1	6,7	4	100
No response	3			
TOTAL	18	100	4	100

TABLE : ALB16.2 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Perceived reasons why delivery service quality has improved

	New Road		Old Road	
	No.	%	No.	%
Deliveries in better condition	4	28,6		
Convenience	4	28,6		
Time decreases - fresh produce	2	14,3		
No response	4	28,6		
TOTAL	14	100	0	0

TABLE : ALB16.3 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Perceived reasons why delivery service quality has not changed

	New Road		Old Road	
	No.	%	No.	%
Old, untarred road harmful to deliveries			2	50
No response	1	100	2	50
TOTAL	1	100	4	100

TABLE : ALB17 (NEW) - LIBODE ROAD - BUSINESS IMPACT SURVEY

If the road was closed for ONE DAY/ONE WEEK/ONE MONTH/RAINY SEASON of the year would it inconvenience you? How would this inconvenience you?

	Inconvenienced For							
	Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Business decline	6,5	38,2	1	5,9				
Shopper decline								
Delivery decline	3,5	20,6	0,5	2,9				
Unable to fetch goods	3	17,6	1,5	8,8				
Restrict personal movement								
Other	1	5,9	—	—	—	—	—	—
TOTAL	14	82,4	3	17,6	0	0	0	0

17 (100%) respondents are inconvenienced. No response = 1. N=18

TABLE : ALB17 (OLD) - LIBODE ROAD - BUSINESS IMPACT SURVEY

If the road was closed for ONE DAY/ONE WEEK/ONE MONTH/RAINY SEASON of the year would it inconvenience you? How would this inconvenience you?

	Inconvenienced For							
	Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Business decline								
Shopper decline								
Delivery decline								
Unable to fetch goods	1	25	1	25	1	25		
Restrict personal movement								
Other	1	25	—	—	—	—	—	—
TOTAL	2	50	1	25	1	25	0	0

4 (100%) respondents are inconvenienced. N=4

TABLE : ALB18.1 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Do you feel that your business has benefited from the building of this road? [Could you guess at a percentage increase or decrease in turnover over the past two years?]*

	New Road		Old Road	
	No.	%	No.	%
Business has profitted from the road improvement	14	77,8	1	25
No change in business profit	4	22,2	3	75
TOTAL	18	100	4	100

*Average turnover of NEW ROAD INCREASED over the past two years by 15,32%

*Average turnover of OLD ROAD DECREASED over the past two years by 8,7[illegible]

TABLE : ALB18.2 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Perceived rea. for business profit from the improved road

	New Road		Old Road	
	No.	%	No.	%
Shopping increased	6,5	50		
Increase in deliveries	4,5	34,6		
Decrease in vehicle maintenance	1,5	11,5		
Use of road all year round	0,5	3,8	1	10[illegible]
No response	1			
TOTAL	14	100	1	100

TABLE : ALB18.3 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Perceived reasons for no change in business profit from the improved road

	New Road		Old Road	
	No.	%	No.	%
Shopping decreased	1	25		
Shopping has remained the same	1	25	2	66,7
No response	2	50	1	33,3
TOTAL	4	100	3	100

TABLE : ALB20 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Since road has been built where do you feel more people do their shopping?

	New Road		Old Road	
	No.	%	No.	%
Locally	5	31,3	1	25
Libode	3,5	21,9	1,5	37,5
Umtata	7,5	46,9	1,5	37,5
No response	2			
TOTAL	18	100	4	100

TABLE : ALB21/22 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Has the building of this road resulted in cost savings for you and would you be prepared to pay anything towards the cost of the road improvement?

	Road results in cost savings				Road has no cost savings			
	New Road		Old Road		New Road		Old Road	
	No.	%	No.	%	No.	%	No.	%
Prepared to pay	10	55,5			2	11,1	3	75
Not prepared to pay	4	22,2	—	—	2	11,1	1	25
TOTAL	14	77,8	0	0	4	22,2	4	100

TABLE : ALB24.1 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Since this road has been built do you have more difficulty competing with business outside this area?

	New Road		Old Road	
	No.	%	No.	%
Less difficulty when competing with business from outside the region	9	53	1	33,3
More difficulty when competing with business from outside the region	8	47	2	66,7
No response	1	—	1	—
TOTAL	18	100	4	100

TABLE : ALB24.2 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Perceived reasons for less difficulty when competing with business from outside the region

	New Road		Old Road	
	No.	%	No.	%
Only business in area	3	33,3		
No response	6	66,7	1	100
TOTAL	9	100	1	100

TABLE : ALB24.3 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Perceived reasons for more difficulty when competing with business from outside the region

	New Road		Old Road	
	No.	%	No.	%
Customers buy outside the region	8	100	2	100
TOTAL	8	100	2	100

TABLE : ALB28 - LIBODE ROAD - BUSINESS IMPACT SURVEY

Some people think that when a road is built there are a number of effects. From the following list what do you think the most important effect of building a road is and what do you think the least important effect of building a road is?

	New Road				Old Road			
	Most		Least		Most		Least	
	No.	%	No.	%	No.	%	No.	%
Increased agricultural activity							1	33,3
Improved business activity	4	40	1	8,3	1	33,3		
Reduced travel time	1	10	1	8,3			1	33,3
Decreased accidents	1	10	4	33,3				
Reduced travel costs	1	10						
Use of road all year round	3	30	1	8,3	1	33,3	1	33,3
Better employment opportunities			2	16,7				
Increase of population into the area					1	33,3		
Greater access to medical facilities			1	8,3				
Greater access to education facilities			1	8,3				
Better government services			1	8,3				
No response	8		6		1		1	
TOTAL	18	100	18	100	4	100	4	100

TABLE : ASBi - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Zone location of Business

	No.	%
A	2	3,9
B	2	3,9
C	1	2
F	34	66,7
I	1	2
K	1	2
L	3	5,9
M	2	3,9
NO	1	2
P	1	2
Q	3	5,9
	51	100

TABLE : ASBii - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Business position of respondent

	No.	%
Owner	18	36
Manager	29	58
Assistant	3	6
No response	1	
TOTAL	51	100

TABLE : ASRiii - STERKSPRUIT ROAD - BUSINESS IMPACT STUDY

Business type

	No.	%
Cafe/fast food	13	25,5
General dealer	13	25,5
Retail/specialist	12	23,5
Manufacture	6	11,8
Hardware	3	5,9
Wholesaler	2	3,9
Drycleaner	1	2
Garage	1	2
TOTAL	51	100

TABLE : ASB1 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

How long have you been in this type of business?

	No.	%
Business operating in the area for less than 2 years	11	21,6
Business operating in the area for more than 2 years	40	78,4
TOTAL	51	100

TABLE : ASB2 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

IF OWNER HAS BEEN IN BUSINESS LESS THAN 2 YEARS [ASB1] : What was your motivation for involvement in business?

	No.	%
Profit	5	50
Perceived need of area	5	50
No response	1	
TOTAL	11	100

TABLE : ASB3/4/5 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Have you moved your business location since the tarring of this road and what are the reasons thereof? [Where did you live two years ago and where do you live now?]

	No.	%
Businesses which have moved since the tarring of the road	1*	2
Businesses which have not moved since the tarring of the road	48	98
No response	2	
TOTAL	51	100

*Business moved because of advantages of the road.

TABLE : ASB6 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Since this road has been tarred do you think that people travel further to take advantage of your store/business?

	No.	%
People travel further to take advantage of business	40	78,4
People do not travel further to take advantage of business	11	21,6
TOTAL	51	100

TABLE : ASB7/9 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Has the tarring of the road in the Sterkspruit [Hersnel] district had any effect on you and the community and what are the greatest effects of tarring this road? [Specify in detail]

	No.	%
Increase in mobility	10,5	20,8
Increase in business activity	9	17,5
Decrease in travel time	5,5	10,6
Decrease in vehicle maintenance	4	8,1
Increase in through traffic	4	7,3
Increase in shopping	3,5	6,9
Increase in access to centres	3	6,4
Increase in taxi and bus movement	1,5	2,9
Other (positive effect)	8	15,7
Other (negative effect)	2	3,9
TOTAL	51	100

TABLE : ASB8 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

When this road was being constructed what did you expect would happen?

	No.	%
Increase in mobility	11	23,4
Increase in business activity	8,5	18,1
Increase in government investment	5	10,6
Increase in shopping	4	8,5
Decrease in travel time	3,7	7,9
Increase in taxi and bus movement	3	6,4
Increase in through traffic	2,5	5,3
Other (positive effect)	7,8	16,6
Other (negative effect	1,5	3,2
No response	4	
TOTAL	51	100

TABLE : ASB10 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Do you think the tarring of this road has had any economic effect on the region?

	No.	%
Road has an economic effect	39	81,3
Road has no economic effect	9	18,8
No response	3	
TOTAL	51	100

TABLE : ASB11 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

IF ROAD HAS AN ECONOMIC EFFECT [ASB10] : In what way does it have an economic effect?

	No.	%
Decrease in vehicle maintenance	10	25,6
Business has improved	8,5	21,8
Road has aided agglomeration in Sterkspruit	5,5	14,1
Increase in shopping	3,5	9
Increase in mobility	2,5	6,4
Increase in through traffic	2,5	6,4
Other	6,5	16,7
TOTAL	39	00

TABLE : ASB12 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Have government services improved in the area since this road has been tarred?

	No.	%
Government services have improved	29	56,9
No change in government services	22	43,1
TOTAL	51	100

TABLE : ASB13 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

IF GOVERNMENT SERVICES HAVE IMPROVED [ASB12] : What kind of government services have improved?

	No.	%
Administration of government	9	34,6
Clinics and health	5,5	21,2
Water	4	15,4
Agricultural extension services	2,7	10,4
Electricity	2,3	8,8
Others	2,5	9,6
No response	3	
TOTAL	29	100

TABLE : ASB14 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

From which town do you buy the majority of your stocks for your business?

	No.	%
Orange Free State	15,3	31,3
Transkei - Sterkspruit	14,8	30,3
Cape	11,8	24,1
Transvaal	3,5	7,1
Other (R.S.A.)	3,5	7,1
No response	2	
TOTAL	51	100

TABLE : ASB15.1 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Has the frequency of your delivery service to your store improved?

	No.	%
Frequency of delivery has improved	41	83,7
No change in frequency of delivery	8	16,3
No response	2	
TOTAL	51	100

TABLE : ASB15.2 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Perceived reasons why delivery service frequency has improved?

	No.	%
Travel time reduced	15	40,5
Wholesale delivery more frequent	6	16,2
Convenient for delivery	4	10,8
Use of the road all year round	3	8,1
Ease of fetching own goods	3	8,1
Other	6	16,2
No response	4	
TOTAL	41	100

TABLE : ASB15.3 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Perceived reasons why delivery service frequency has not changed

	No.	%
Fetch own goods	2	25
No maintenance on other routes	3	37,5
No response	3	37,5
TOTAL	8	100

TABLE : ASB16.1 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Has the quality of your delivery service to your store improved?

	No.	%
Quality of delivery service has improved	36	76,6
No change in quality of delivery service	11	23,4
No response	4	
TOTAL	51	100

TABLE : ASB16.2 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Perceived reasons why delivery service has improved

	No.	%
Deliveries in better condition	20	66,7
Use of road all year round	3	10
Time decrease results in fresh produce	2	6,7
Easier to fetch own goods	2	6,7
Vehicle maintenance decreased	2	6,7
Greater security of goods	1	3,3
No response	6	
TOTAL	36	100

TABLE : ASB16.3 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Perceived reasons why delivery service quality has not changed

	No.	%
Fetch own goods	3	27,3
No maintenance on other roads	2	18,2
Quality has remained the same	1	9
No response	5	45,5
TOTAL	11	100

TABLE : AS B17 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

If the road was closed for ONE DAY/ONE WEEK/ONE MONTH/RAINY SEASON of the year would it inconvenience you? How would this inconvenience you?

	Inconvenienced For							
	Day		Week		Month		Season	
	No.	%	No.	%	No.	%	No.	%
Business decline	10	20,4	2	4,1	7	14,3		
Shopper decline	4	8,2	4	8,2				
Delivery decline	6	12,2	2	4,1	1	2		
Unable to fetch goods	2	4,1	2	4,1				
Restrict personal movement	3	6,1						
Other	1	2	1	2	2	4,1		
TOTAL	26	53,1	11	22,4	10	20,4	0	0

47 (95,9%) respondents are inconvenienced. 2 (4%) respondents are not inconvenienced. No response = 2.
N=51

TABLE : ASB18.1/19 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Do you feel that your business has benefited from the tarring of this road? [Could you guess at a percentage increase or decrease in turnover over the two past years]*

	No.	%
Business has profited from the road improvement	45	91,8
No change in business profit	4	8,2
No response	2	
TOTAL	51	100

*Average business turnover INCREASED over the past two years by 25,41%

TABLE : ASB18.2 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Perceived reasons for business profit from the improved road

	No.	%
Shopping increased	13	30,2
People travel further to take advantage of business	10	23,3
Increase in through traffic	5	11,6
Access increased	3	7
Mobility increased	3	7
Agglomeration of Sterkspruit	2	4,7
Other	7	16,3
No response	2	
TOTAL	45	100

TABLE : ASB18.3 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Perceived reasons for no change in business profit from the improved road

	No.	%
Shopping has remained the same	2	50
Customers buy outside the region	1	25
Other	1	25
TOTAL	4	100

TABLE : ASB20 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Since the road has been tarred where do you feel more people do their shopping?

	No.	%
Sterkspruit	38	82,6
Aliwal North	4	8,7
Lady Grey	1,5	3,3
Other	2,5	5,4
No response	5	
	51	100

TABLE : ASB21/22 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Has the tarring of this road resulted in cost savings for you and would you be prepared to pay anything towards the cost of the road improvement?

	Road Results in Cost Savings		Road has no Cost Savings	
	No.	%	No.	%
Prepared to pay	32	64	1	2
Not prepared to pay	12	24	5	10
TOTAL	44	88	6	12

TABLE : ASB24.1 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Since this road has been tarred do you have more difficulty competing with businesses outside the area?

	No.	%
Less difficulty when competing with business from outside the region	33	64,7
More difficulty when competing with business from outside the region	18	35,3
TOTAL	51	100

TABLE : ASB24.2 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Perceived reasons for less difficulty when competing with business from outside the region

	No.	%
Only business in the area	9	34,6
Shopping increased	5	19,2
Residents travel further to reach businesses	4	15,4
Greater variety	3	11,5
Agglomeration at Sterkspruit	2	7,7
Other	3	11,5
No response	7	
TOTAL	33	100

TABLE : ASB24.3 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Perceived reasons for more difficulty when competing with business from outside the region

	No.	%
Customers buy outside the region	15	88,2
Other	2	11,8
No response	1	
TOTAL	18	100

TABLE : ASB28 - STERKSPRUIT ROAD - BUSINESS IMPACT SURVEY

Some people think that when a road is tarred there are a number of effects. From the following list what do you think the most important effect of tarring a road and what do you think the least important effect of tarring a road is?

	Most Important		Least Important	
	No.	%	No.	%
Increased agricultural activity	2	4,4	10	22,7
Improved business activity	24	53,3	4	9,1
Reduced travel time	7	15,6	11	25
Decreased accidents			5	11,4
Reduced travel costs	3	6,7	4	9,1
Use of the road all year round	7	15,6	1	2,3
Better employment opportunities			2	4,5
Increase of population into the area	1	2,2	2	4,5
Greater access to medical facilities	1	2,2	4	1
Greater access to educational facilities				
Better government services			1	2,3
No response	6		7	
TOTAL	51	100	51	100

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