

Cotton, No Till-2021

NC STATE
UNIVERSITY

ESTIMATED COSTS AND RETURNS PER ACRE, 2021
900 POUND YIELD

	UNIT	QUANTITY	PRICE OR COST/UNIT	TOTAL PER ACRE	YOUR FARM
1. GROSS RECEIPTS*					
COTTON LINT	LBS	900.00	\$0.69	\$621.00	_____
COTTON SEED	LBS	1503.00	\$0.08	\$120.24	_____
TOTAL RECEIPTS:				\$741.24	_____
2. VARIABLE COSTS					
SEED	THOU.	46.00	\$2.11	\$97.06	_____
FERTILIZER*					
NITROGEN (30% solution)	LBS	150.00	\$0.14	\$21.00	_____
PHOSPHATE (DAP 18-24-12)	LBS	100.00	\$0.25	\$25.00	_____
POTASH (0-0-60)	LBS	50.00	\$0.21	\$10.50	_____
BORON	LBS	3.00	\$1.35	\$4.05	_____
SULFUR	LBS	10.00	\$0.28	\$2.80	_____
LIME (PRORATED)	TON	0.33	\$54.50	\$17.99	_____
HERBICIDES*	ACRE	1.00	\$93.37	\$93.37	_____
INSECTICIDES	ACRE	1.00	\$36.54	\$36.54	_____
GROWTH REG. & DEFOLIANTS	ACRE	1.00	\$21.30	\$21.30	_____
SURFACTANT	ACRE	1.00	\$7.56	\$7.56	_____
SCOUTING	ACRE	1.00	\$16.00	\$16.00	_____
GINNING	LBS	900.00	\$0.12	\$108.00	_____
CROP INSURANCE	ACRE	1.00	\$30.00	\$30.00	_____
TRACTOR/MACHINERY*	ACRE	1.00	\$45.37	\$45.37	_____
LABOR	HRS	2.27	\$12.67	\$28.76	_____
INTEREST ON OP. CAP.	DOL.	\$205.65	2.7%	\$5.59	_____
TOTAL VARIABLE COSTS:				\$570.89	_____
3. INCOME ABOVE VARIABLE COSTS:				\$170.35	_____
4. FIXED COSTS					
TRACTOR/MACHINERY*	ACRE	1.00	\$122.92	\$122.92	_____
TOTAL FIXED COSTS:				\$122.92	_____
5. OTHER COSTS					
GENERAL OVERHEAD	DOL.	\$570.89	7.0%	\$39.96	_____
TOTAL OTHER COSTS:				\$39.96	_____
6. TOTAL COSTS:				\$733.77	_____
7. NET RETURNS TO LAND, RISK, AND MANAGEMENT:				\$7.47	_____

BREAK-EVEN YIELD

VARIABLE COSTS	658	LBS	<u>BREAK-EVEN PRICE</u>	VARIABLE COSTS	\$0.50
TOTAL COSTS	889	LBS	TOTAL COSTS	TOTAL COSTS	\$0.68

* This budget was developed for planning purposes only and does not include storage cost, land rent, or government payments

*Prices paid to farmers are subject to change based on global, national, and local market conditions, budget represents futures + or - local basis

*Fertilization rates are not a recommendation but a estimate of realized cost based on: <https://articles.extension.org/sites/default/files/fertilization.pdf>

*Machinery fixed and variable cost assume a round bale cotton picker not requiring a module builder, each farm will need to consider how these distribute over their farming operation based on their number of acres as these budgets assume ideal farm size to leverage savings from equipment

*Herbicide cost represent three sprays at retail pricing, many cotton acres are sprayed four times over depending on year, soil type, and location

COTTON - NO TILL						
PER ACRE MACHINERY AND LABOR REQUIREMENTS FOR 830 LBS COTTON - NO TILL						
MONTH	OPERATION	TIMES OVER	LABOR HOURS	MACHINE HOURS	VARIABLE COSTS	FIXED COSTS
4	PLANTER NO-TILL 8-ROW	1.00	0.13	0.12	\$7.96	\$15.24
3 thru 9	HIBOY 100'	10.00	0.22	0.20	\$6.50	\$57.50
10	COTTON PICKER 6-ROW ROUND BALE	1.00	0.20	0.18	\$19.01	\$41.15
10	BALE HAULER	1.00	0.37	0.34	\$11.90	\$9.03
PER ACRE TOTALS FOR SELECTED OPERATIONS			1.01	0.84	\$45.37	\$122.92
UNALLOCATED LABOR(HRS./AC.)			1.26			

INCOME ABOVE VARIABLE COSTS AT DIFFERING YIELDS AND PRICES						
YIELD		PRICE (\$/lbs.)				
LINT	SEED	\$0.55	\$0.62	\$0.69	\$0.76	\$0.83
		\$0.060	\$0.070	\$0.080	\$0.090	\$0.100
720	1202	-\$81.17	-\$18.75	\$43.67	\$106.09	\$168.51
810	1353	-\$33.41	\$36.82	\$107.05	\$177.28	\$247.51
900	1503	\$14.29	\$92.32	\$170.35	\$248.38	\$326.41
1035	1728	\$85.84	\$175.57	\$265.30	\$355.03	\$444.76
1125	1879	\$133.60	\$231.14	\$328.68	\$426.22	\$523.76

*NC STATE DOES NOT ENDORSE ANY COMPANY OR CHEMICAL NAMES ASSOCIATED TO ACTIVE INGREDIENTS

**CHEMICALS LISTED ARE NOT A RECOMMENDATION FOR CHEMICAL USE BUT A REPRESENTATION OF COST ASSUMPTIONS ONLY

CHEMICAL USE ASSUMPTIONS FOR 900 LBS COTTON - NO TILL						
	UNIT	QUANTITY	PRICE OR COST/UNIT	TOTAL PER ACRE	MONTH	
**HERBICIDES						
flumioxazin (Valor)	OZ	2.00	\$4.50	\$9.00	MAY	
2,4-D	PT	4.00	\$1.82	\$7.29	MAY	
glyphosate (Roundup ultra)	QT	2.00	\$4.19	\$8.38	2 X MAY/JUN	
Fomasafen (Reflex)	PT	1.50	\$8.88	\$13.32	APR	
Acetochlor (Warrant)	PT	2.25	\$3.03	\$6.82	APR	
dicamba (Banvel)	PT	2.00	\$9.79	\$19.58	JUN	
s-metolachlor (Dual Magnum EC)	PT	2.00	\$7.75	\$15.50	JUN	
glufosinate (Liberty)	OZ	29.00	\$0.46	\$13.48	JUN	
**INSECTICIDES						
imidacloprid (Admire Pro)	OZ	9.00	\$1.00	\$9.00	MAY	
bifenthrin	OZ	6.40	\$0.82	\$5.27	JUL	
acephate (Orthene)	OZ	16.00	\$0.37	\$5.86	JUL	
Chlorantraniliprole (Prevathon)	OZ	14.00	\$1.17	\$16.41	JUN	
**GROWTH REGULATOR & DEFOLIANTS						
mepiquat chloride (Pix)	OZ	16.00	\$0.29	\$4.69	2X JUN, JUL	
ethephon+cyclanilide (Finish6)	QT	0.75	\$13.38	\$10.03	SEP	
tribufos (Folex)	PT	1.00	\$6.58	\$6.58	SEP	
TOTAL:				\$151.21		

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