APPLICATIONS

SOIL INFORMATION

TEXTURE: SIX
PH: 5.8
%OM: 3.4
PREV.CROP: GLXMA - Soybean
%RESIDUE: 0
PLOT WIDTH: 7.5 X 30 FEET
PLOT AREA: 225 FEET

TRIAL INFORMATION

DESIGN: RCB
REPS: 3

APPL. NUMBER	01	02	UNIT
TIMINGS	09	12	
TYPE	LIQUID MI	LIQUID MI	
APPLICATION DATE	05/13/20	06/17/20	AME
TIME - BEGIN	17:40	11:10	24H
TIME - END	17:55	11:20	24H
AIR TEMPERATURE	59	85	F
% REL.HUMIDITY	38	35	
WIND DIRECTION	SOUTHEAST	EAST	
WIND SPEED	7.0	3.0	M/H
CLOUD COVER	CLOUDY-~6	PAR.CLOUD	
DEW	TO BE SEL	NO	
SOIL MOISTURE	DRY/MOIST	DRY/MOIST	
SOIL CONDITION	TO BE SEL	TO BE SEL	
SOIL TEMP/DEPTH	53/4.00	78/4.00	F/IN
METHOD	SPRAY	SPRAY	
EQUIPMENT	BACKPACK/	BACKPACK/	
PROPELLANT	COMPRESSE	COMPRESSE	
PLACEMENT	BROADCAST	BROADCAST	
NOZZLE	FLATFAN	FLATFAN	
NOZZLE DESCRIPTION			
NOZZLE VOLUME	0.00	0.00	GPM
NOZZLE NUMBER	5	5	
NOZZLE SPACING	18.000	18.000	IN
SCREEN SIZE			
SCREEN SZ DESC	N/A	N/A	
SWATH WIDTH	7.5	7.5	FT
BOOM HEIGHT	20.0	20.0	IN
SPEED	3.00	3.00	M/H
MIX SIZE	0.330	0.330	
MIX SIZE UNIT	GAL	GAL	
SPRAY VOLUME	20.00	20.00	
SPRAY VOLUME UNIT	GPA	GPA	
PRESSURE	30.00	30.00	PSI
DILUENT	WATER	WATER	
INC. DATE			AME
INC. START			24H
INC. END			24H
INC. DEPTH			IN
INC. EQUIPMENT	TO BE SEL	TO BE SEL	
FOLIAGE HEIGHT			FT
FOLIAGE WIDTH			FT
ROW WIDTH			FT
SPRAY VOL LWA/TRV			
S VOL LWA/TRV UNIT			
LEAF WALL AREA			M2H
TREE ROW VOLUME			M3H
SPECIE AND STAGE	DEN / STG MIN / MAX	DEN / STG MIN / MAX	
CROP *			
P, Dent corn		---/16	
NK1082-5222A-EZ1		24.0/24.0	IN
(PLANTED) 05/13/2020		35 DAP	
PEST *			
P, Velvetleaf		---/17	
		1.50/12.0	IN
P, Waterhemp, commo		---/19	
		5.00/11.0	IN
P, Tall morning glo		---/16	
		0.50/5.00	IN

*** CONTINUE

SPECIE AND STAGE	DEN / STG MIN / MAX	DEN / STG MIN / MAX	
PEST *			
P, Giant foxtail		---/16 1.00/12.0	IN
P, Common cocklebur		---/16 3.00/11.0	IN

*** TIMING CODES**
09 = --- / PREEMERGENCE
12 = --- / POST

*** STAGE CODE**
16 = 6 LEAVES UNFOLDED
16 = 6 LEAVES UNFOLDED
16 = 6TH TRUE LEAVES/LEAF PAIRS/WHORLS UNFOLDED
17 = 7TH TRUE LEAVES/LEAF PAIRS/WHORLS UNFOLDED
19 = >8 TRUE LEAVES/LEAF PAIRS/WHORLS UNFOLDED

DATA MEAN

TITLE: Helm University HPPD Trial. AS-400
CREATED: 04/29/2020 **REVISED:** 12/11/2020 **COMPLETED:** N
PROJECT TYPE: HERBICIDE
LOCATION: Urbana **RESEARCHED BY:** UNIV. OF ILL
DESIGN: RANDOMIZED COMPLETE BLOCK DESIGN
PLOT SIZE: 7.50 FT **WIDE X** 30.00 FT **LONG**
PLOT AREA: 225.00 SFT

REPS: 03

TRT NUM	TREATMENT COMPONENT	DOSAGE RATE	UNIT	TM	ZEAMD CON % 06/17/20	SETFA CON % 06/17/20	AMATA CON % 06/17/20	ABUTH CON % 06/17/20	PHBPU CON % 06/17/20	XANST CON % 06/17/20
1A	CHECK	0.00	NA	0	0	0	0	0	0	0
2A	»FEARLESS XTRA	1.50	QMA	9	0	99	99	43	32	0
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
3A	»FEARLESS XTRA	1.50	QMA	9	0	98	99	50	38	17
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
4A	»HELMET 7.8EC	1.50	PMA	9	0	95	67	22	17	17
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
5A	»HELMET 7.8EC	1.50	PMA	9	0	91	70	25	17	17
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
6A	»FEARLESS XTRA	1.50	QMA	9	0	98	98	32	25	3
7A	»HELMET 7.8EC	1.50	PMA	9	0	98	93	13	3	3
8A	»DEGREE XTRA 4S	3.50	QMA	9	0	99	99	70	57	17
B	AATREX 4L	1.50	PMA	9						
9A	»TRIZMET II 5.5	2.50	QMA	9	0	98	95	65	53	37
10A	CHECK	0.00	NA	0	0	0	0	0	0	0
	LSD (0.05)				0.0	2.6	4.2	15.2	19.7	14.2
	STANDARD DEVIATION				0.0	1.2	2.0	7.3	9.4	6.7

DATA MEAN

TITLE: Helm University HPPD Trial. AS-400
CREATED: 04/29/2020 **REVISED:** 12/11/2020 **COMPLETED:** N
PROJECT TYPE: HERBICIDE
LOCATION: Urbana **RESEARCHED BY:** UNIV. OF ILL
DESIGN: RANDOMIZED COMPLETE BLOCK DESIGN
PLOT SIZE: 7.50 FT **WIDE X** 30.00 FT **LONG**
PLOT AREA: 225.00 SFT

REPS: 03

TRT NUM	TREATMENT COMPONENT	DOSAGE RATE	UNIT	TM	ZEAMD CON % 06/24/20	SETFA CON % 06/24/20	AMATA CON % 06/24/20	ABUTH CON % 06/24/20	PHBPU CON % 06/24/20	XANST CON % 06/24/20
1A	CHECK	0.00	NA	0	0	0	0	0	0	0
2A	»FEARLESS XTRA	1.50	QMA	9	0	99	99	60	52	60
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
3A	»FEARLESS XTRA	1.50	QMA	9	0	99	99	90	80	82
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
4A	»HELMET 7.8EC	1.50	PMA	9	0	95	71	42	33	40
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
5A	»HELMET 7.8EC	1.50	PMA	9	0	98	85	75	70	73
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
6A	»FEARLESS XTRA	1.50	QMA	9	0	98	98	28	17	3
7A	»HELMET 7.8EC	1.50	PMA	9	0	97	92	12	3	3
8A	»DEGREE XTRA 4S	3.50	QMA	9	0	98	99	67	35	12
B	AATREX 4L	1.50	PMA	9						
9A	»TRIZMET II 5.5	2.50	QMA	9	0	96	95	53	28	20
10A	CHECK	0.00	NA	0	0	0	0	0	0	0
	LSD (0.05)				0.0	3.2	4.7	14.9	13.8	11.5
	STANDARD DEVIATION				0.0	1.5	2.2	7.1	6.6	5.5

DATA MEAN

TITLE: Helm University HPPD Trial. AS-400
CREATED: 04/29/2020 **REVISED:** 12/11/2020 **COMPLETED:** N
PROJECT TYPE: HERBICIDE
LOCATION: Urbana **RESEARCHED BY:** UNIV. OF ILL
DESIGN: RANDOMIZED COMPLETE BLOCK DESIGN
PLOT SIZE: 7.50 FT **WIDE X** 30.00 FT **LONG**
PLOT AREA: 225.00 SFT

REPS: 03

TRT NUM	TREATMENT COMPONENT	DOSAGE RATE	UNIT	TM	ZEAMD CON % 07/01/20	SETFA CON % 07/01/20	AMATA CON % 07/01/20	ABUTH CON % 07/01/20	PHBPU CON % 07/01/20	XANST CON % 07/01/20
1A	CHECK	0.00	NA	0	0	0	0	0	0	0
2A	»FEARLESS XTRA	1.50	QMA	9	0	99	99	70	37	67
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
3A	»FEARLESS XTRA	1.50	QMA	9	0	98	99	99	53	99
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
4A	»HELMET 7.8EC	1.50	PMA	9	0	99	70	57	28	59
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
5A	»HELMET 7.8EC	1.50	PMA	9	0	98	78	89	57	89
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
6A	»FEARLESS XTRA	1.50	QMA	9	0	98	98	13	0	0
7A	»HELMET 7.8EC	1.50	PMA	9	0	97	90	0	0	0
8A	»DEGREE XTRA 4S	3.50	QMA	9	0	98	99	33	13	7
B	AATREX 4L	1.50	PMA	9						
9A	»TRIZMET II 5.5	2.50	QMA	9	0	97	94	30	10	17
10A	CHECK	0.00	NA	0	0	0	0	0	0	0
	LSD (0.05)				0.0	1.7	8.2	15.6	14.5	14.5
	STANDARD DEVIATION				0.0	0.8	3.9	7.4	6.9	6.9

DATA MEAN

TITLE: Helm University HPPD Trial. AS-400
CREATED: 04/29/2020 **REVISED:** 12/11/2020 **COMPLETED:** N
PROJECT TYPE: HERBICIDE
LOCATION: Urbana **RESEARCHED BY:** UNIV. OF ILL
DESIGN: RANDOMIZED COMPLETE BLOCK DESIGN
PLOT SIZE: 7.50 FT **WIDE X** 30.00 FT **LONG**
PLOT AREA: 225.00 SFT

REPS: 03

TRT NUM	TREATMENT COMPONENT	DOSAGE RATE	UNIT	TM	ZEAMD CON % 07/14/20	SETFA CON % 07/14/20	AMATA CON % 07/14/20	ABUTH CON % 07/14/20	PHBPU CON % 07/14/20	XANST CON % 07/14/20
1A	CHECK	0.00	NA	0	0	0	0	0	0	0
2A	»FEARLESS XTRA	1.50	QMA	9	0	99	99	78	37	77
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
3A	»FEARLESS XTRA	1.50	QMA	9	0	98	99	99	50	99
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
4A	»HELMET 7.8EC	1.50	PMA	9	0	99	78	63	23	62
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
5A	»HELMET 7.8EC	1.50	PMA	9	0	97	83	89	40	89
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
6A	»FEARLESS XTRA	1.50	QMA	9	0	98	98	8	0	0
7A	»HELMET 7.8EC	1.50	PMA	9	0	96	90	0	0	0
8A	»DEGREE XTRA 4S	3.50	QMA	9	0	98	99	18	0	0
B	AATREX 4L	1.50	PMA	9						
9A	»TRIZMET II 5.5	2.50	QMA	9	0	98	93	23	0	13
10A	CHECK	0.00	NA	0	0	0	0	0	0	0
	LSD (0.05)				0.0	2.4	6.7	13.0	11.5	12.8
	STANDARD DEVIATION				0.0	1.1	3.2	6.2	5.5	6.1

DATA MEAN

TITLE: Helm University HPPD Trial. AS-400
CREATED: 04/29/2020 **REVISED:** 12/11/2020 **COMPLETED:** N
PROJECT TYPE: HERBICIDE
LOCATION: Urbana **RESEARCHED BY:** UNIV. OF ILL
DESIGN: RANDOMIZED COMPLETE BLOCK DESIGN
PLOT SIZE: 7.50 FT **WIDE X** 30.00 FT **LONG**
PLOT AREA: 225.00 SFT

REPS: 03

TRT NUM	TREATMENT COMPONENT	DOSAGE RATE	UNIT	TM	ZEAMD CON % 08/07/20	SETFA CON % 08/07/20	AMATA CON % 08/07/20	ABUTH CON % 08/07/20	PHBPU CON % 08/07/20	XANST CON % 08/07/20
1A	CHECK	0.00	NA	0	0	0	0	0	0	0
2A	»FEARLESS XTRA	1.50	QMA	9	0	99	99	70	22	70
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
3A	»FEARLESS XTRA	1.50	QMA	9	0	99	96	99	40	99
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
4A	»HELMET 7.8EC	1.50	PMA	9	0	99	80	60	17	60
B	»KATAGON 2OD	3.20	ZMA	12						
C	»MSO	1.00	PMV	12						
D	»28% UAN	2.50	PMV	12						
5A	»HELMET 7.8EC	1.50	PMA	9	0	98	87	89	33	89
B	»KATAGON 2OD	3.20	ZMA	12						
C	AATREX 4L	1.50	PMA	12						
D	»MSO	1.00	PMV	12						
E	»28% UAN	2.50	PMV	12						
6A	»FEARLESS XTRA	1.50	QMA	9	0	98	98	3	0	0
7A	»HELMET 7.8EC	1.50	PMA	9	0	95	90	0	0	0
8A	»DEGREE XTRA 4S	3.50	QMA	9	0	93	97	13	0	0
B	AATREX 4L	1.50	PMA	9						
9A	»TRIZMET II 5.5	2.50	QMA	9	0	94	87	20	0	10
10A	CHECK	0.00	NA	0	0	0	0	0	0	0
	LSD (0.05)				0.0	7.8	6.7	15.1	10.2	13.1
	STANDARD DEVIATION				0.0	3.7	3.2	7.2	4.9	6.2

» **= SUPPLEMENTAL CHEMICAL**

*** TIMING CODES**
00 = --- / UNTREATED TIMING
09 = --- / PREEMERGENCE 05/13/2020(1)
12 = --- / POST 06/17/2020(2)

H#	CUSTOM#1	CUSTOM#2	EV.DATE	S#	TYP	SPECIE	STAGE	RAW	PRT	SYM	MTH	CNF	BASIS	C.M	CTRT	SS	NOTE
001	ZEAMD	CON %	06/17/2020	01	P	ZEAMD	16	RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
002	SETFA	CON %	06/17/2020	02	P	SETFA	16	RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
003	AMATA	CON %	06/17/2020	03	P	AMATA	19	RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
004	ABUTH	CON %	06/17/2020	04	P	ABUTH	17	RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
005	PHBPU	CON %	06/17/2020	05	P	PHBPU	16	RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
006	XANST	CON %	06/17/2020	06	P	XANST	16	RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
007	ZEAMD	CON %	06/24/2020	01	P	ZEAMD		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
008	SETFA	CON %	06/24/2020	02	P	SETFA		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
009	AMATA	CON %	06/24/2020	03	P	AMATA		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
010	ABUTH	CON %	06/24/2020	04	P	ABUTH		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
011	PHBPU	CON %	06/24/2020	05	P	PHBPU		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
012	XANST	CON %	06/24/2020	06	P	XANST		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
013	ZEAMD	CON %	07/01/2020	01	P	ZEAMD		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
014	SETFA	CON %	07/01/2020	02	P	SETFA		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
015	AMATA	CON %	07/01/2020	03	P	AMATA		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
016	ABUTH	CON %	07/01/2020	04	P	ABUTH		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
017	PHBPU	CON %	07/01/2020	05	P	PHBPU		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N

DATA MEAN

TITLE: Helm University HPPD Trial. AS-400

H#	CUSTOM#1	CUSTOM#2	EV.DATE	S#	TYP	SPECIE	STAGE	RAW	PRT	SYM	MTH	CNF	BASIS	C.M	CTRT	SS	NOTE
018	XANST	CON %	07/01/2020	06	P	XANST		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
019	ZEAMD	CON %	07/14/2020	01	P	ZEAMD		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
020	SETFA	CON %	07/14/2020	02	P	SETFA		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
021	AMATA	CON %	07/14/2020	03	P	AMATA		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
022	ABUTH	CON %	07/14/2020	04	P	ABUTH		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
023	PHBPU	CON %	07/14/2020	05	P	PHBPU		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
024	XANST	CON %	07/14/2020	06	P	XANST		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
025	ZEAMD	CON %	08/07/2020	01	P	ZEAMD		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
026	SETFA	CON %	08/07/2020	02	P	SETFA		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
027	AMATA	CON %	08/07/2020	03	P	AMATA		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
028	ABUTH	CON %	08/07/2020	04	P	ABUTH		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
029	PHBPU	CON %	08/07/2020	05	P	PHBPU		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N
030	XANST	CON %	08/07/2020	06	P	XANST		RAW	ALL	CON	%	---	1.00 PL	NO	0001	0	N

*** SPECIES COMMON NAME - VARIETY/SPECIE INFO (IF APPLICABLE)**
01 = NK1082-5222A-EZ1

*** STAGE CODE**
16 = 6 LEAVES UNFOLDED
16 = 6 LEAVES UNFOLDED
16 = 6TH TRUE LEAVES/LEAF PAIRS/WHORLS UNFOLDED
17 = 7TH TRUE LEAVES/LEAF PAIRS/WHORLS UNFOLDED
19 = >8 TRUE LEAVES/LEAF PAIRS/WHORLS UNFOLDED