## Q17 Power Transistors Selection Table

Pair of transistors for the driver stage.

	Minimum Vds =	150	came V	(ac(th) rango (4)	/\ close	trancduct	anco (Gfc)			air of transist	ors ro	r the arive	r stage.							Q7 v1.3
	Minimum Vds = 150V, same Vgs(th) range (4V), close transductance (Gfs)  Minimum default config													ss filter)			Q/ VI.3			
	DEFAULT		Status	Parts		Gfs Sie		R7	R8	Freq MHz		R7	RR	Freq MHz		R7	sistor valu	Freq MHz	OK	Comment
Config D1	Q5	P	EOL	FQP3P20	6	1.23	190	10	_	8.38		104,7		1104111112	2	100	110	2	Yes	
	Q6	N	EOL	FQP3N30	7	1.25	75	10	100	-,		104,7	265,25		3	100	120	8	Yes	Original config
	40		202	. 4. 5. 50		1.75	,,,		100	21,22			200,20				120		103	
	LIVE		Status	Parts	Qg nC	Gfs Sie	Ciss pF	R7	R8	Freq MHz		R7	R8	Freq MHz		R7	R8	Freq MHz	OK	Comment
Config D2	Q5	Р		FQPF7P20	25	3.5	770	10	00	2,06		93,95		2.2	2	100		2.2	Yes	Small oscillation at clip (Q6).
•	Q6	N	EOL	2SK3564	17	2.6	700		100			,	103,34	2,2	2		100	2,2	Yes	, , , , , , , , , , , , , , , , , , , ,
	1 -4-									,			, .							•
	TESTED Status Parts Og nC Gfs Sie Ciss pF R7 R8 Freq MHz R7 R8															R7	R8	Freq MHz	OK	Comment
Config D3	Q5	Р		FQPF7P20	25	3.5	770	10	00	2,06		93,95		Freq MHz	2	100		2,2	Yes	
•	Q6	N		FQPF3N80C	16.5	3	705		100	2,25			108,55	2,2	2		100	2,2	Yes	
	•									•		•	•	•			•			
	CANDIDATE		Status	Parts	Qg nC	Gfs Sie	Ciss pF	R7	R8	Freq MHz		R7	R8	Freq MHz		R7	R8	Freq MHz	ОК	Comment
	Q5	Р		IRF9610	11	0.9		10	00	9,36		104,02			Э					
	Q6	N		IRF610	8.2	0.8	140		100	11,36			126,31		Э					
	,									•										
	CANDIDATE		Status	Parts	Qg nC	Gfs Sie	Ciss pF	R7	R8	Freq MHz		R7	R8	Freq MHz		R7	R8	Freq MHz	ОК	Comment
	Q5	Р		IRF9620	22	1	350	10		4,54		101,05		4,5						
	Q6	N		IRF620	14	1.5	260		100	6,12			136,02	4,5	5					
	Pair of transistors for the output stage.  Minimum Vds = 150V, same Vgs(th) range (4V), close transductance (Gfs)																			
		150V																		
	DEFAULT		Status	Parts	Qg nC	Gfs Sie	Ciss pF	R14	R15	Freq KHz		R14	R15	Freq KHz		R14	R15	Freq KHz	OK	Comment
Config S1	Q15	N		FQA46N15	110	36	2500	33	30	192,92		335,06		190	)	330		190	Yes	Original config
	Q16	Р	n.a	FQA36P15	105	19.5	2550		330	189,13			328,49	190	0		330	190	Yes	Original coning
	LIVE		Status	Parts	Qg nC	Gfs Sie	Ciss pF	R14	R15	Freq KHz		R14	R15	Freq KHz		R14	R15	Freq KHz	OK	Comment
Config S2	Q15	N		FQA46N15	110	36	2500	33	,0	192,92		335,06		190	ס	330		190	Yes	Overshoot with config D3. Ok with D2
	Q16	Р		IXTH48P20P	103	32	5400		330	89,31			155,12	190	כ		150	190	Yes	Need R15=150R to remove overshoot
	TESTED		Status			Gfs Sie	Ciss pF	R14	R15	Freq KHz		R14	R15	Freq KHz		R14	R15	Freq KHz	OK	Comment
Config S5	Q15	N		FQA46N15	110	36	2500	33		192,92		335,06		190		330		190	Yes	Tested with config D2.
	Q16	Р		IXTQ36P15P	55	19	3100		330	155,57			270,21	. 190	)		180	285	Yes	Need R15=180R to remove overshoot.
	CANDIDATE		Status	Parts	Qg nC	Gfs Sie	Ciss pF	R14	R15	Freq KHz		R14	R15	Freq KHz		R14	R15	Freq KHz	OK	Comment
Config S6	Q15	N		IXTQ50N20P	70	23	2720	33		177,31		307,96		190		300		190		
	Q16	Р		IXTQ36P15P	55	19	3100		330	155,57			270,21	. 190	)		270	190		
														•						
_	CANDIDATE		Status	Parts		Gfs Sie	Ciss pF	R14	R15	Freq KHz		R14	R15	Freq KHz		R14	R15	Freq KHz	OK	Comment
Config S4	Q15	N		IXTQ36N30P	70	22		33		214,35		372,29		190		374		190		
	Q16	P		IXTQ36P15P	55	19	3100		330	155,57			270,21	. 190	)		270	190		
	1			1						1										
	TESTED		Status			Gfs Sie		R14	R15	Freq KHz		R14	R15	Freq KHz		R14	R15	Freq KHz	OK	Comment
Config S3	Q15	N		IXTQ50N20P	70	23		33		177,31		307,96		190		300		190	Yes	48v max. Tested with config D2.
	Q16	Р		IXTQ52P10P	60	20	2845		330	169,52			294,43	190	)	İ	170	330	Yes	Need R15=170R to remove overshoot
		_		In .	1	ar a:	I.a		1	I=		L	I	I		In	l	I=		I
	CANDIDATE	١	Status			Gfs Sie		R14	R15	Freq KHz		R14	R15	Freq KHz	_	R14	R15	Freq KHz	ОК	Comment
	Q15	N		IXFH50N85X	152	32		33		107,65		186,97	455 :-	190						ļ
	Q16	Р		IXTH48P20P	103	32	5400	1	330	89,31	<u> </u>	<b> </b>	155,12	190	7	1	l	1	1	<u> </u>
	CANDID -==	1	Ct.:	Int.	lo	Cf- C'		D4.4	ln45	F 222		D4.4	D4F	Ir	1	lna a	D45	F 1011	6	Io
	CANDIDATE	A.1	Status			Gfs Sie		R14	R15	Freq KHz		R14	R15	Freq KHz	1	R14	R15	Freq KHz	OK	Comment
	Q15	N		IRFP240	70	6.9		33		370,99	<u> </u>	644,35	600.00	190			<b> </b>	-	-	<del> </del>
	Q16	Р		IRFP9240	44	9.4	1200	l	330	401,90	-	<del>                                     </del>	698,04	190	7	1	L	l	l	1
	CINA NIOT WOOD	INIC	Chat	Doubo	0=	Cfe Ci-	Ciaa T	D14	D15	Fran 211-		D14	D15	Fue at 1711-		D14	D15	F== 1/11-	C''	Icamon ant
	SIM NOT WORK		status		ug nc	Gfs Sie		R14	R15	Freq KHz		R14	R15	Freq KHz	1	R14	R15	Freq KHz	OK	Comment
	Q15	N		ECX10N20	1	1	500	33		964,57	-	1675,31	1675 34	190		<b> </b>	<b> </b>		-	
	Q16	Р		ECX10P20	1	1.5	500	l	330	964,57	l		1675,31	. 190	7	1	L	l	l	1
	CIRA NIOT	151.0	Ct.:	Int.	lo	Cf- C'		D4.4	ln45	F 222		Da a	D4F	Ir	1	lna a	D45	F 1011	6	Io
	SIM NOT WORK		Status		Qg nC	uts Sie	Ciss pF		R15	Freq KHz	<u> </u>	R14	R15	Freq KHz	+	R14	R15	Freq KHz	OK	Comment
	Q15	N		ECW20N20	1	8	900	33		535,87	-	930,73		190			<del>                                     </del>	-	-	<u> </u>
	Q16	Р		ECW20P20	1	3	1850	1	330	267,93		l	452,78	190	J	i	l			
Pair of transistors for op-amp power supply																				
	Administration 12.1	co: .		(41-) ( :					Pai	r of transistors	tor o	p-amp pov	ver supply							
	Minimum Vds =	60V,				01 01	e: =	2.00				D 40				D 40			011	
	DEFAULT		Status	rarts	ug nc	Gfs Sie	Ciss pF	R40	R41	Freq MHz		R40	R41	Freq MHz		R40	R41	Freq MHz	OK	Comment

William vas = oov, same vgs(tif) lange (+V)																			
Config A1	DEFAULT		Status	Parts	Qg nC	Gfs Sie	Ciss pF	R40	R41	Freq MHz		R40	R41	Freq MHz	R40	R41	Freq MHz	OK	Comment
	Q1	N		IRF610		0.8	140	100		11,36		126,31		9	120		9		
	Q4	Р		IRF9610	_	0.9	170		100	9,36			104,02	9		100	9		