

A		B	C	D	E	F	G	H	I	J	K
1	<b>I. Bocal</b>		Original bocal; Key3 not original							Key1	Key2
2	dia reed end		inside diameter of reed end of bocal								
3	bocal string length (0, 1)		length of bocal inserted into receiver								
4	metal bocal length top (0, 1)		meas. along top of bocal								
5	metal bocal length bot (0, 1)		meas. along bottom of bocal								
6	dia wj end		inside diameter of bocal								
7											
8	bocal logic	2	if bocal logic = 0 ==> bocal is choke; if bocal logic = 1 ==>choke in wing joint calc; if bocal logic = 2 ==> no bocal							2	2
9											
10											
11											
12											
13	<b>II. Wing Joint Lengths</b>		bocal receiver: Key3 NO receiver; Bocal reciever bore has been replaced								
14	choke bore dia.	10.6	logic 1; bore diameter of choke; logic 0; either diameter bocal bottom or beginning of bore at bottom or receiver							9.8	10.2
15	receiver length (1, 0) (formally choke length)	6.3	logic 1; length of choke from top of wing joint; logic 0; length of receiver (same as string length)							60	80
16	wing joint length	51.7	total wing joint length, including tenon and socket							521	521
17	tenon length	46.3	tenon length							50.4	49.5
18											
19	wj f2	238	dist top of wing to where tone hole enters bore [not at the center of the tone hole]							232	230
20	wj e	292								293	294
21	wj d	328								330	330
22											
23	Bore dia. Bottom of wing joint	16.9	key3 Need to Average, usally oval; yes 16.5 x 17.2							16.2	16.4
24	Bore dia. top of boot joint small side	16.8								16.7	16.7
25	Bore dia. top of boot joint large side	25.2								25.6	24.9
26											
27	<b>III. Boot Lengths</b>		Key3 No Two whole design; normal rounded cork plus								
28	bj logic	1	logic=> if bj logic = 0 ==> plug removed; if bj logic = 1 ==> plug cannot be removed							1	1
29	bj c	93	dist from top of boot to where topmost tone hole enter bore [not at center of tone hole]							90	90
30	bj b	157								157	156
31	bj a	196								198	194
32											
33	bjstotal [Needed for both boot logics]	426	vrfd; total length of boot, include socket, along the small bore side,							427	424
34	bjtotal [Needed for both boot logics]	426	total length of boot, include socket, along large bore side							427	424
35	plug small [Need for logic 0 only]	0	plug thickness, large bore side							0	0
36	plug large [Need for logic 0 only]	0	plug thickness, small bore side							0	0
37											
38	boots [Needed for both boot logics]	390	hook length along s bore ==> bjs-septum length = boot - septum <= calc the septum	Hook length	36					392	392
39	bootl [Needed for both boot logics]	390	hook length along l bore ==> bjil-septum length = boot - septum <= calc the septum							392	392
40											
41	boots bottom [Needed for both boot logics]	17	use hook, dist of bore [dist on stick plus 7mm, diff between hook and bot of stick] 10 + 7 =17							16	15
42	bootl bottom [Needed for both boot logics]	17	use hook, dist of bore [same as boots bot except tenon depth will be different]							16	15
43											
44	extreme bore [Needed for logic 1 only]	47	Key3 verified large; Outside dia of plug [measured] = small bore dia + large bore dia + the septum width							46.2	42.8
45											
46	septum length exp [Need for logic 0 only]	0	dist. from very bottom of boot to septum [point between the large and small bore]							0	0
47	septum length calc - do not imput value	36	dist. From very bottom of boot to spetum [bil - bootl]	do not imput value						35	32
48	septum length - do not imput value	36	if bj logic = 0 ==> septum = septum exp; if bj logic = 1 ==> septum = septum calc	do not imput value						35	32
49											
50	sbore dia sep* [Needed for both boot logics]	19.7	septum small bore dia [assume = lbore dia sep]							19.7	19.7
51	lbore dia sep* [Needed for both boot logics]	20.1	septum large bore dia [assume = sbore dia sep] [mesure if cork can be removed; for Logic 0]							20.3	20.2
52	sep width exp [Need for logic 0 only]	0	septum width; direct measurement if remove plug							0	0
53	sep width calc - do not imput value	7.2	septum width; calc. ==> extreme bore - sbore - lbore	do not imput value						6.2	2.9
54	sep width - do not imput value	7.2	if bj logic = 0 ==> sep width = sep width exp; if bj logic = 1 ==> sep width = sep width calc	do not imput value						6.2	2.9
55											
56	bj g	362	dist from top of boot (socket) to where G hole enters bore [not at cent of tone hole]							361	361
57	bj f1	140	dist from top of boot (socket) to where F1 hole enters bore [not at cent of tone hole]							144	144
58											
59											
60											
61											
62											
63	<b>IV. Tone Hole Diameters</b>		Key3, small finger holes on wing joint								
64	f2	4								4.4	4.8
65	e	4.4								5.3	5.4
66	d	5								5	5.1
67											
68	c	6.9								7	6.5
69	b	6.3								7	6.5
70	a	5.5								5.5	5.4
71	g	8.3								7.3	7.3
72	f1	11.6								10.4	10.7
73											
74	e1	9.8	e1 tone hole dia, on long joint [need to average NS and EW dias, NS usually greater]							9.5	10.5
75	d1	9.2	d1 tone hole dia, on long joint [need to average NS and EW dias, NS usually greater]							9.1	9.1
76	c1	13.2	c1 tone hole dia, on long joint [need to average NS and EW dias, NS usually greater]							13.2	13.1
77											
78											
79											
80											
81											
82	<b>V. Tone Hole Depths</b>										
83	f2	24.8								29	25.2
84	e	25								25.1	25.3
85	d	26.5								25.3	27
86											
87	c	20.5								20	21.5
88	b	19.5								22.2	21
89	a	20.7								18.5	19.7
90	g	18.2	meas along bot tone hole wall [north wall, toward reed,tone hole usually at angle]							18.3	16.5
91	f1	22.8	meas along east side tone hole wall [north wall, toward reed,t hole usually at angle]							19	21.5
92											
93	e1	9	e1 tone hole depth;meas east/west with deapth gauge [at center, or shortest dist]							9.1	11.2
94	d1	9	d1 tone hole depth; meas east/west with deapth gauge [at center, or shortest dist]							10.2	8.6
95	c1	8.5	c1 tone hole depth; meas east/west with deapth gauge [at center, or shortest dist]							8.9	8.4
96											
97											
98											
99											
100											
101	<b>VI. Long Joint</b>		Key3 There is a table along long joint								
102	lg_length	572	total length of long joint							573	573
103	lg_tenon_bot	50.3	length bottom tenon on long joint [tenon going into boot joint]							49.7	50
104	l_bot_bore	25.2	long joint bottom tenon bore diameter [tenon going into boot joint]							25.5	24.8

[illegible]