

Concept Table for Handout 4 – Key to Keys. Not all concepts are included – only the more difficult ones. The 1<sup>st</sup> column – Reference # will be used in the Session to refer to Key locations.

Ref#	Concept	Relevant Slides*	Key Sections	Key Words**	Couplet(s)	Remarks
1	Plant habit	5 & 6	Initial key (to other keys)	annual, biennial, etc.	1 (2 <sup>nd</sup> lead)	used with <i>Palafoxia</i> dbl. keying
2a	Receptacle naked or chaffy (pales or bristles)	7	B	receptacle, naked, palea, bristles	1, 10	Receptacle misspelled at 2 <sup>nd</sup> lead to couplet 10.
2b	“ “ “	7	C	receptacle, naked, epaleate	8	epaleate – w/o paleae (pales)
2c	“ “ “	7	C	receptacle, palea, bristles, scales	8 (2 <sup>nd</sup> lead)	2 <sup>nd</sup> lead to 8
2d	“ “ “	7	FOV (~F)	receptacle, palea, bristles,	1	key word better palea than with e
2e	“ “ “	7	FOV (~F)	receptacle, naked	1 (2 <sup>nd</sup> lead)	
2f	“ “ “	7	G	receptacle, chaffy	2	
2g	“ “ “	7	G	receptacle, naked, rarely with bristles	2 (2 <sup>nd</sup> lead)	
2h	“ “ “	7	G	receptacle, chaffy	13	
2i	“ “ “	7	G	receptacle, naked	13 (2 <sup>nd</sup> lead)	
3a	Beaked vs. beakless cypsela	2, 15, 38	C	cypselas beaked	2	did not point out in 1 <sup>st</sup> session
3b	“ “ “	2, 15, 38	C	cypselas beakless	2 (2 <sup>nd</sup> lead)	did not point out in 1 <sup>st</sup> session
3c	“ “ “	2, 15, 38	D	cypselas, beaked	1	don't search both words simultaneously
3d	“ “ “	2, 15, 38	D	cypselas beakless	1 (2 <sup>nd</sup> lead)	did not point out not in 1 <sup>st</sup> session
4	Heads typical 3 types	17	many sections	discoid, radiate, liguliflorus/ligulate	many coupl.	these common types <u>not</u> marked in red
5	Heads <u>not</u> typical 3 types (i.e. not discoid, radiate, ligulate)	26* 27*	Initial key (to other keys)	disciform	3 (1 <sup>st</sup> lead or 3a)	not discoid, but (superficially resembles it; has filiform/pistillate florets on margin)
5a	“ “ “	26* 27*	Initial key (to other keys)	disciform, radiant (neither common)	4 (2 <sup>nd</sup> lead or 4b)	not discoid nor radiate
5b	“ “ “	26* 27*	Initial key (to other keys)	disciform, radiant (neither common)	5 (1 <sup>st</sup> lead or 5a)	discoid is also there in 5a, but common
5c	“ “ “		A	disciform (not common)	4 (2 <sup>nd</sup> lead)	discoid is also there in 4b, but common
5d	“ “ “	26*	FOV	radiant – Weakley does not use this word in FOV but applies to <i>Marshallia</i> & some species of <i>Centaurea</i> .		
5e	“ “ “	25 new	not keyed in Weakley	trimorphic – with marginal ligulate florets; next row in tubular discoid florets w. regular symmetry & center is discoid florets w. bilateral symmetry.		Weakley does not yet key <i>Chaptalia</i> & the word <u>trimorphic</u> is <b>not</b> found in “Key to Keys” (6 pgs.) but Wunderlin & Hansen, 3 <sup>rd</sup> ed. (2011) use this term for the head in type for <i>Chaptalia</i> .
6	Calculus	32, 36	B & C	calculus	19 (2 <sup>nd</sup> lead) for B & couplet 1 in Key C; <u>3 genera in SEUS</u>	
7	Capillary bristle type pappus	2, 38, 42, 48*	B, D, FOV	B-1, D-6 & D-10, FOV-9 (#s = couplets)		simple capillary, barbellate, and plumose (feathery) types
8a	Sexuality of Head	44-46*	C	disk florets functionally staminate	13	for opposite leaved spp. (e.g. <i>Silphium</i> )
8b	“ “ “	44-46*	G	disk florets sterile with style undivided	3 (1 <sup>st</sup> lead)	for alternate leaved spp. (e.g. <i>Silphium</i> )

\*Slide numbering may be different for you all depending on what you did with the 2 late sent slides and slide set for earlier session may be off by 2 to 3 slides.

\*\*If working electronically, you are better off to type few, even one, word.