Searching for Rebloom's Origins ~ Mike Lockatell



above: I. cengialtii K-23A photo: Tom Silvers I. cengialtii K-23A is a species clone obtained from Terry Varner of Ohio Gardens and originally came from Kew Royal Botanic

Gardens in London.

After much optimism in the later portion of the twentieth

century, advances in reblooming iris development still seem elusive. Pollen daubers are few and the gene pool remains restrained. Breeding for the trait requires significant persistence and perseverance to find reliable seedlings particularly for cold climates.

The late Dr. R.G. Smith wrote in the AIS Bulletin for the October 1959 edition, "the reblooming tendency is triggered by a complex pattern of inheritance having to do with rhizome maturation rate, plant vigor, health and disease resistance, ability to utilize water and fertilizer, absence of summer dormancy and deciduousness, and probably a number of additional factors. It may be further assumed that the factors within the general pattern are inherited as recessive traits somewhat according to regular tetraploid inheritance ratios." Like a scavenger hunt, clues and prizes can turn up practically anywhere.

Tom Silvers, a diploid breeding specialist from Rohrersville, MD and this author have commenced a research project to better understand rebloom's origins to help guide future breeding. This investigation was sparked by Tom's diploid species cross pollination of a *I.cengialtii* clone K23A, by SPEC-X Clown Pants (Silvers 2006). The parentage of Clown Pants is (*I. variegata* x *I. suaveolens* var. mellita).

Four rebloomers emerged from two dozen seedlings. Careful reselection resulted in Cricket Song (Silvers 2012) and Easy Smile (Silvers, R. 2009). The two MTBs have reliably rebloomed in October at Tom's Maryland garden since 2006.

AIS Bulletin editor Terry Aitken devoted the January 2001 issue to reblooming irises. The late Jim Craig from Oregon shared his experiences with rebloom using *I.aphylla* clones to create better branching on medians including miniature tall beardeds (MTBs) or table irises in an article entitled "Rebloom: Median Iris Involving Iris aphylla". My friend and mentor, the late Dr. Lloyd Zurbrigg mentioned the story in conversation.



above: Gracchus (T. S. Ware 1884) photo: Scott Kunst, Old House Gardens

Whatever his intentions were at the time, he played to my curiosity. After his passing in 2005, I have made some test cross pollinations to define the *I. aphylla* impact on rebloom. Early results have been encouraging. A Wild Petticoats (L. Markham 2001) X Renown (Zurbrigg 1992) combination did result in first generation rebloom seedlings.

Tom Silvers' chance cross has now put *I.cengialtii* in the spotlight for its impact on remontancy. R. G. Smith wrote the reblooming iris chapter for the World of *Irises* published in 1978; in his discussion of "Species and Interspecies Rebloomers" on Page 142, I.cengialtii is absent from the list. The usual rebloom species suspects are mentioned such as I. mellita; aphylla biflora; pallida; pumila; variegata (remontant, Paul Cook). Why was *I.cengialtii* left out? Tom located an 1886 article attributed to the famed physiologist and iris hybridizer, Sir Michael Foster, in The Gardeners' Chronicle. Foster writes, a *I. cengialtii* clone given to

him by Thomas S. Ware "flowers with great regularity a second time in autumn."

TB Gracchus (T. S. Ware 1884), a historic rebloomer with unrecorded ancestry was released during the same time frame. Could an *I. cengialtii* clone have been in the pedigree? Dr. G. Percy Brown from Barre and Westport (Central Village) Massachusetts used Gracchus with TB Gertrude (W. Petersen 1907) to create Autumn Elf (G.P. Brown 1935). Registered as an intermediate, this faithful diploid rebloomer would form the foundation for Doc Percy's famed cold climate varieties.

Research also uncovered a story written by Rebecca Hamel for the Barre, MA Gazette; Hamel discovered a 1972 feature story on Dr. Brown's iris hybridizing by Mary Kelly for the same community newspaper. Kelly recalled Brown encountering a field of irises in the Barre outskirts after graduating from Harvard Medical School around 1919. The garden was at the summer home of Miss Grace Sturtevant. Sturtevant was a famed iris hybridizer and one of the American Iris Society founders. Grace and her brother Robert imported the best available irises from Europe including Foster introductions for testing and breeding.

If my friendship with Lloyd Zurbrigg can be used as a guide, it is entirely possible Dr. Brown forged a similar bond with the Sturtevants centered around iris culture and hybridizing. In a tribute to Sir Michael Foster entitled "What Our Gardens Owe to His Work," Robert Sturtevant acknowledged Foster's initial I. cengialtii use in iris breeding: "I wish to speak first of the least of these, the *Cengialtii* hybrids; Typically they are (in my garden) a few days earlier to bloom than most varieties; they are good growers, free blooming, rather like small pallidas."

John C. Wister later writes in the same issue, "Of the Perry varieties King George (*cengialtii*) and Perry's

Favorite (*cengialtii*) have been the best, both coming with the Intermediates and being very free, and inclined to bloom in October."

According to JoAnne Tufts' recollection in the AIS Bulletin (Number 154, July 1959), Brown enjoyed some rebloomers growing in the Sturtevants' Barre garden in 1929. "He liked them so well, he started on his long trail to improve them." Tom and this author strongly believe Doc Percy and the Sturtevants made the *I. cengialtii* connection to rebloom. Despite unknown parentage, TB Ambrosia (Sturtevant 1928) shows up in September Sparkler's (G.P. Brown 1943) pedigree. If Brown did know about *I.cengialtii*'s value for cold climate rebloom, he apparently kept the secret to himself.

With the exception of TB Autumn Sensation (G.P. Brown 1962), the Massachusetts derived cold climate rebloom varieties disappear in the pedigrees of today's modern hybrids. For Doc Percy, the strategy for success was rebloom first. Even though he was outcrossing to improve flower form, colors and bloomstalks, his breeding counterparts wanted quicker progress to compete with spring only kinds. This philosophy may have been a mistake.

Reblooming bearded irises as a class are still greatly misunderstood particularly by AIS judges. One way to improve perception is to create contrasting public display beds with historic and modern rebloomers. The complexity of working for summer and fall flowering types comes into better focus. Despite a small circle of pollen daubers, progress has been made. Future advances however will be made with a better understanding of past breeding efforts. Can we be patient for improvements to materialize?

Tom Silvers and this author are trying to uncover the cornerstones of early rebloom breeding. Dr. G.P. Brown's famed cold climate selections are slowly disappearing from commerce. Lloyd Austin, Tom Craig, E. G. Lapham, Edwin Rundlett, Howard Weed, Charles Wise, R.G. Smith and Lloyd Zurbrigg originations are suffering a similar fate. They need to be rediscovered and appreciated in public settings.



above: White Autumn King (H.P. Sass 1935) IB-EE-Re-WW. (Autumn King x ...)

If you are still growing correctly identified early historic bearded rebloomers with a cutoff date around 1970, please consider contacting Mike Lockatell at CMarti8855@verizon.net or 804-330-2916 or Tom Silvers at tesilvers@yahoo.com or 301-606-5710. Your assistance in our continuing research will be greatly appreciated.

[Ed. note -- Mary Hess of Bluebird Haven Iris Garden, grows an extensive collection of Lloyd Austin iris, including many rebloomers; she purchased remaining stock from Lloyd Austin's widow Gladys Austin, who was nearby in Placerville, when Gladys was closing out the garden

www.bluebirdhavenirisgarden.com] [See next page for bibliography]







above: Gertrude (Peterson 1907) (a parent of Autumn Elf)

above: Morning Splendor (Shull 1923) (used in breeding rebloomers by Dr. George Percy Brown)

above: Flora Zenor (J. Sass 1941) (used in breeding rebloomers)

Suggested Reading and Sources

- Craig, Jim. "Rebloom: Median Iris Involving *Iris aphylla*".

 **Bulletin of the American Iris Society no. 320, Jan 2001, p. 26. AIS Bulletin editor Terry Aitken devoted the January 2001 issue to reblooming irises.
- Foster, Sir Michael. "Iris cengialti, An Attempt Towards Garden Nomenclature". The Gardeners' Chronicle: a weekly illustrated journal of horticulture and allied subjects.

 May 8, 1886, p. 554-555. This is available online at http://www.biodiversitylibrary.org/item/84276#page/572/mode/1up and also at http://wiki.irises.org/bin/view/Spec/SpecCengialti
- Hamel, Rebecca, MA. "The Irises of G. Percy Brown". Reprinted from *The Barre Gazette*, 1972 (Barre, Massachusetts). http://www.hips-roots.com/articles/notable-gp-brown.html
- Hamel, Rebecca. Gardening Topic for May 2007: "Inspired by Doc. G. Percy Brown, Reblooming Iris Hybridizing". Provided by the Western Massachusetts Master Garden er Association. http://www.wmassmastergardeners.org/0705.htm
- Lowe, Mike. "Autumn Twilight (G.Percy Brown '45)"
 http://www.worldiris.com/public_html/ROOTS_Ar
 ticles/Autumn_Twilight.html
 also available at http://www.hips-roots.com/articles/
 autumn-twilight.html
 Reprinted from ROOTS: The Journal of the Historic Iris
 - Reprinted from ROOTS: The Journal of the Historic Iris Preservation Society, Vol. 10, Issue 1, Spring 1997.
- Mahan, Clarence. "Historic Remontant Irises".

 http://www.worldiris.com/public_html/ROOTS_Ar
 ticles/Historic_Remontants.html
 also available at http://www.hips-roots.com/articles/histremontents.html
 Reprinted from *ROOTS*, Vol. 2, Issue 1, Spring 1989
- Silvers, Thomas. "Rebloom's Alpine Connections," *The Reblooming Iris Recorder*, 83-1: 20-22, Spring 2014.
- Smith, Raymond. G. "Hybridizing for Rebloomers". *Bulletin of the American Iris Society* no. 155, October 1959, p. 29.
- Sturtevant, R. S. "What Our Gardens Owe to His Work" *Bulletin of the American Iris Society* no. 3, June 1921, pps. 12-13. [Sir Michael Foster issue]
- Tufts, JoAnne. "Mr. May to November" [Dr. George Percy Brown] *Bulletin of the American Iris Society* no. 154, July 1959, Part I, pps. 41-42.
- Warburton, Bee & Melba Hamblen, editors. *The World of Irises*. Wichita, Kansas: American Iris Society, 1978.
- Wister, John C. "Visits to Iris Nurseries and Gardens". *Bulletin of the American Iris Society* no. 3, June 1921, see p. 26.