pack trials 2005

companion coverage

Vegetative Matters	page	18
The Rest of the Trials	page	22
Breeding Breakthroughs	page	26
Best in Show	page	38

Frialing the /arieties

Seeing all the new varieties at Pack Trials is great, but how do they really perform?



Left: The osteo trials at Pacific Plug & Liner were grouped together on one bench for easy variety comparison. Right: 'Astra Violet'.

he California Pack Trials' original goal was to help growers decipher what varieties best fit into their production programs and met their customer's needs. The Pack Trials have now evolved into a new product showcase, where breeders and suppliers have the opportunity to show off their product lines and introduce the new varieties for next season. True side-by-side trials seem to have been replaced with marketing and branding. Marketing in our industry is a key part of promoting our products; however, producing these products still depends on good breeding and grower friendly genetics.

So, when Pacific Plug & Liner had the opportunity to host its first official Pack Trial in 2003, we looked to do something that would benefit growers and give them something to take home to their own production programs. We ended up going back to the foundation of Pack Trials and a production-based variety comparison trial. We started with gerbera daisies and have now evolved into showing multiple crops, with a focus on vegetative varieties, reflective of the strong growth in vegetative crops.

THE TRIAL

This year, we decided to focus the trial on vegetative osteospermum. Osteospermum are an up and coming group of plants that have seen significant breeding improvements and introductions over the past few years. Osteospermum can cross over multiple product lines; growers are using these plants as stand alone container items, as well as in mixed combos and baskets. Osteospermum have been an established landscape plant in California for some time, but the advancements in breeding have taken these plants from the freeway to the front porch with some exciting new colors, forms and improved habits.

All plants except Soprano were received as unrooted cuttings and transplanted as a rooted liner on week 51. During the propagation stages, all plants were treated with a 2-ppm Bonzi drench at the time of sticking. After rooting, plants received one pinch to promote lateral branching and were transplanted with established breaks. Additional pinches and chemical treatments applied post-transplant were done on an as needed basis

and varied from plant to plant in an attempt to produce the best-looking product. Because they are from Proven Winners, Sopranos were received as rooted liners and were treated as needed post-transplant.

THE VARIETIES

Astra. This series was new for us in 2004. It is bred by Florensis and offered as an unrooted cutting from Cohen Propagation Nurseries. This crop was unique in that the flower size was typically smaller than others; however, what it lacked in flower size it made up in number. Plants bloomed very consistently and were covered with flowers. From a distance you may confuse an Astra with a Marguerite daisy or single flowered garden mum. This series proved to be naturally compact and required no growth regulator after planting. Flower timing was average, starting week 5 for Violet and week 7 for Rose and White Improved.

FlowerPower. Bred by Selecta Klemm and marketed under the First Class Plants brand, FlowerPower has proven to be a very strong series. The most notable characteristic of this series was its uniformity, especially within the core colors of Purple, Pink and White. The plants started flowering in a two-week window, producing very uniform flower size that covered mounding plants. I would classify this series as a medium vigor group, responding well to a supplemental post-planting drench of 2-ppm Summagic. All plants responded almost identically to the growth regulator, a testament to their uniformity. FlowerPower also has one of the most extensive color ranges available.

Impassions. Brought to market by GGG, Impassion is a moderately compact series that covers the core colors of Purple, Pink and White. We had a hard time getting this series to grow consistently and applied multiple growth regulators. Purple seemed to need the most work, and White probably received too much regulator. Flowering occurred between weeks 6 and 10. The series was a bit variable for containing only three colors. Being naturally on the compact side, it may be suitable for a 4-inch program, which can be a challenging container size for finishing osteopspermum.

Margarita. Fides North America's contribution to the trial proved to be a strong series from the beginning. Most notable about the Margaritas **•**

pack trials 2005

was the excellent lateral branching and the uniformity of growth and habit. Where the Margaritas came up short against competing lines was their flower count and coverage. The plants were loaded with buds, but the flowers emerged sparsely. Flower timing was between weeks 6 and 9, relatively consistent. The plants did require additional growth control in the form of a 2-ppm Summagic drench after planting, which they responded to well and consistently within the series.

Ostica. Bred by Danziger "Dan" Flower Farm, this series has a medium to high vigor, requiring different growth regulators depending on the variety. Flower timing was spread between weeks 9 and 11. Uniformity the latest. Most varieties were on the vigorous side, requiring additional growth control. Pink & White showed the nicest, with large flowers and an overall strong branching.

Serenity. A newer series to the market, Serenity comes from Ball FloraPlant. They are medium vigor and showed strong consistency in branching, flower size and growth control response. This series has distinctly larger flowers that cover the mounding plants. Flower timing was a bit variable, with White being the earliest in week 4 and Pink and Purple both flowering week 10. Overall, a nice series with more colors coming. This series showed very comparable to FlowerPower from Selecta.

and vigor seemed to be the limiting factor in this series. 'Ostica Blue Eye' showed the best, better than the conventional white. Blue Eye had large flowers that completely covered the plant and good lateral branching.

Pinwheel. This naturally compact series is offered via the Bodger Botanicals program, but breeding work is by Kieft Seeds. Pinwheels showed a very similar



Side. Brought to us by Ecke Ranch, Sides are what started the ball rolling in osteospermum production. One of the oldest series and still in strong use, Sides have compact to medium vigor. 'Riverside', a yellow, seemed to be the most off from the series, blooming three weeks later than the rest. 'Riverside' also had the most vigor of the group. 'Wildside' (purple) 'Highside' (pink) and

Left: In addition to greenhouse production, some varieties were moved outside to guage performance in higher light and cooler temperatures. Pictured is 'Side Show Purple'. Right: With the exception of Soprano varieties, all series arrived as unrooted cuttings and were rooted on site at Pacific Plug & Liner to ensure uniformity.

habit to Astra, having small flowers but many of them. The series was also naturally compact, requiring no additional growth control. Flower timing was spread between weeks 5 and 7. Overall, a very nice series that could be successful in a 4-inch program but also showed well in larger containers.

Seamist. This series is also from Bodger Botanicals. What stood out about this series was that it was more of a collection than a series. Nothing was uniform about this group, but there were some standout varieties. Flower timing ranged from week 10 through 14, White being 'Brightside' (white) were on the compact side, requiring no additional growth control after transplant. Branching was moderate. Still a good series, but there has been significant improvements in habit within other series.

Side Show. Also from Ecke but bred by Sakata, Side Shows are marketed as more compact than Side. The most notable improvement was branching and overall flower count. 'Side Show Purple', though slightly more vigorous than other purples, showed the most flower power through-

pack trials 2005

out the trial, with almost no petiole stretch on warm days. Purple was the stand out variety, but Pink and White also showed strongly, especially when grown next to traditional Sides. Flower timing ranged between weeks 7 and 11. Purple required an additional 2-ppm Summagic drench; Pink and White required no additional growth control.

Soprano. Sopranos are from S&G Flowers' breeding but marketed via Proven Winners. Most notable about this series was its very compact habit.

the series needed different growth control depending on the variety. Flower timing was moderately consistent, most averaged between weeks 10 and 12. This series is exciting due to its extensive color range, but more work needs to be done with regards to growing this group consistently.

Finishing this many different series proved to be a unique challenge. The trial really showed the variability across osteospermum breeding lines. We learned quickly that you couldn't expect uniformity in different series

Rooted liners from EuroAmerican Propagators were planted and never treated with growth regulators. Branching was very strong, and overall habit was consistent. Flowering was somewhat variable, with Light Purple flowering week 6 and Purple and White both flowering week 11. A three colors; likely



grown the same way. Growers need to work at series, and even variety, level to identify what culture is appropriate for each variety. breeders Some seemed to have the lead in uniformity; however, as we displayed our trial, new colors and forms were being shown for 2006 at the other Pack Trial locations, creating the need for

great series limited to Left: 'Astra Rose'. Right: 'Spring Star Capella'.

the most compact available.

Summertime Sun. From Dummen Red Fox, Summertime Sun proved to be naturally compact, with White showing the most compact habit. The series was slightly variable in vigor, but all colors stayed on the medium to compact side. Flower timing ranged from week 7 through 9. Some additional growth control was applied but, in the end, was probably not needed.

Sunny. The Sunny series, bred by Sunny APS of Denmark, is sold through Greenex. We grew almost every color of Sunny, with the goal of selecting the best purple, pink, white and yellow. We struggled to get strong branching on most of the color range. Habit was both compact and vigorous; another comparison.

Ryan Hall is production operations manager at Pacific Plug & Liner, Watsonville, Calif. He can be reached by phone at (831) 722-5396 x 219 or E-mail at ryan_hall@ppandl.net.

LearnMore

For more information related to this article, go to www.gpnmag.com/lm.cfm/gp060504