## New Peach and Plum Cultivars for Fresh Market Bill Shane, Michigan State University Extension

Provided here is a summary of peach and plum cultivars of value or potential value to the Michigan fruit industry. Unless stated otherwise all peaches mentioned are yellow melting flesh types. Both established and newer selections are included to provide information on harvest windows and relative value. The number of available cultivars is large and so this list is not comprehensive and is not meant as criticism of cultivars not included.

## Peaches

Peaches are generally self-fertile, with a very few exceptions. Estimated harvest times for fresh market yellow fleshed peaches is expressed here as days before (-) or after (+) Redhaven which harvests approximately late July to early August in southern Michigan. Cultivars ripening before Redhaven tend to be clingstone and after are generally freestone. Peaches are particularly sensitive to mid-winter low temperature damage. More winter hardy cultivars of medium quality are Harrow Diamond (-25), Reliance (-0), Madison (+28) and Harcrest (+28). Redhaven is relatively tough as well, has good reputation for flavor but tends to have split pits and small size problems with its multiple picks is suited more to direct local markets. Other cultivars in the early season reputation for good flavor include PF-5D Big (-22), Desiree (-26), and the relatively new Canadian VeeBlush (-20). Around the Redhaven season are the dependable Summer Serenade (-10), Starfire (+3), PF Lucky 13 (+6), and PF 9A-007 (+5). Messina (+17) has attractive flavorful fruit but is not consistently productive. The new Sweetstar (+20) and older PF24C (+24) have good flavor and fruit size. The flavor of Bellaire (+3), John Boy (+3), Coralstar (+12), Loring (+12) is popular but cold hardiness is not sufficient. Coralstar can have very large fruit size with a light crop. Additional stalwart cultivars for Michigan are PF19-007 (+14), Allstar (+16), and Glowingstar (+22). Rutgers University has recently introduced several new yellow melting flesh peaches—low acid Evelynn (+0), large Selena (+29), and nicely colored Tianna (+35). The Rutgers Gloria (+26) is a somewhat older low acid, very slow softening cultivar much different from traditional yellow melting flesh types. Rounding out the end of the season are the older PF27A (+30), PF28-007 (+32), Flame Prince (+38), and Victoria (+47). Victoria averages only about 60% red blushed skin but has a spicy, firm flesh reminiscent of a non-melting flesh type, but still freestone.

An excellent peento (flat) doughnut peach for Michigan is the older Saturn, a white flesh peento = flat doughnut cultivar. It is very productive, small to medium size, requires extra labor to thin and pick, has a tendency to split skin at the stem and is prone to brown rot, but has excellent flavor. Rutgers University has several newer peento peach cultivars including the non-melting flesh Buenos II (-3), TangOs (yellow flesh, somewhat non-melting) (+7), and TangOs II (cream white/slight green) (+4). Galactica (+12) is white fleshed, low acid and prone to bacterial spot.

The choices for useful nectarines are more limited because of diseases (brown rot and bacterial spot), surface blemishes, and small fruit size problems. Some of the more reliable yellow melting flesh types are the older Easternglo (-10) the newer West Virginia Nectafest (-10) and Rutgers Avalon (-12), older June Glo (-7), newer PF11-Nectarine (+0), the new semi-freestone very productive Brigantine (+0) from Rutgers, and the older Flavortop (+12) and Fantasia (+31). New to Michigan is the very early medium-sized Carene (-14)

## <u>Plums</u>

Older plum cultivars for the cooler humid eastern growing areas have come from the breeding programs at Cornell (Anderson), USDA Georgia (Okie), and more recently, University of Wisconsin (Smith). The big challenges for plums are tree and fruit bud hardiness, fruit pitting by bacterial spot—brown rot is generally controllable. European prune-type plums tend to be pollen incompatible with Japanese plum types. Some plum cultivars are partially self-fruitful but would benefit from a compatible pollen partner. Plums with a reputation for being partially self-fruitful include Stanley, Italian, Santa Rosa and Methley. Estimated harvest times for plums is expressed here as days before (-) or after (+) Stanley which harvests approximately the 1<sup>st</sup> week in September in southern Michigan.

Japanese type plums such as the older cultivars Early Golden (-52), Methley (-40), Shiro (-35), Red Heart (-13), and Simka (+0) bloom relatively early in Michigan and are subject to spring frost problems. Of these Shiro, a yellow plum, tends to be most hardy of the group and purple-red Simka has nice eating qualities. Luisa is a newer large football-shaped red-yellow plum (perhaps a European plum) from New Zealand that is relatively productive with nice eating quality.

European plums are more hardy than Japanese types and can be used for both fresh and processing. Damson types, a once popular processing plum in Michigan, are small, have a tart flavor. Stanley, the #1 plum, is medium quality but relatively hardy. Best opportunities for higher quality European plums in Michigan are Vanette (-27), Castleton (-11), Bluebyrd (-5), NY9 (+2), Long John (+3), and Empress (+13). Unlike Stanley, sometimes sour around the pit, these plums are sweet throughout. Castleton is productive, with smaller but more flavorful fruit than Stanley. Tulare Giant (+4) and Sutter (+15) from the University of California have nice quality but need more testing to determine tree and fruit bud hardiness.

Also relatively hardy are Japanese X American hybrids such as the clingstone Alderman (+20) and Toka (Bubblegum<sup>TM</sup>). Black Ice<sup>TM</sup> (Lydecker) (+0) from the Univ. of Wisconsin has not been consistently productive in Michigan trials. Also worthy of mention are the older cultivars Superior and Underwood for direct market sales in cold-challenged growing sites.

Pluots, aprium, plumcots are hybrids between plum and apricot. Many of these are very sweet. These hybrids tend to be more prone to winter damage than European plum and for this reason are generally not grown commercially in Michigan to any large extent.