the Tip Sheet

Stage 3 Tip Sheet –Placement of Pathway Cohorts, Pathway Teaching Team Common Planning Time as well as Singletons, Doubletons, and Multiple-Section Courses in the Master Schedule

Some definitions:

Singletons are courses that are only taught a single time. They can only be placed in a single period in a schedule of classes. When possible, singletons should be placed so that there is no head-to-head conflict with other singletons or doubletons. When this is not possible, use the conflict matrix report to help guide your work.

Doubletons are courses that are taught twice in a schedule of classes. Doubleton sections placement logic is similar to that used when placing singletons. Look for the times with the least head-to-head conflicts with other singletons and doubletons.

Tripletons are courses that are taught three times in a schedule of classes. Tripleton sections placement logic is similar to that used when placing singletons and doubletons. Look for the times with the least head-to-head conflict with other singletons and doubletons.

Multiple section courses are courses that are taught three or more times during a schedule of classes.

Concurrent Sections/Concurrent courses are courses that may need to be scheduled in order to combine classes in the same classroom in the same period. Reasons for concurrent scheduling may include combining two different, but related courses in the same classroom. For example, a section of Mandarin III might be combined with a section of Mandarin IV or a section of Media III combined with a section of Media IV. Sometimes, an academic course might serve students from two closely related pathways/academies. For example, a section of English II might combine 20 "overflow" students from the Biotechnology pathway with 12 "overflow" students from the Engineering pathway;. The other English II Biotechnology and English II Engineering courses were full or were scheduled at times that presented a schedule conflict to the students involved. Typically, in concurrent classes, two different student rosters are maintained

As the CCASN staff interviewed administrators, counselors, registrars, and teacher leaders about their master scheduling practices, we heard a wide range of responses to the query, "Which course or courses do you place first when you are building the master

schedule?" Some, especially in schools with wall-to-wall academies and/or Linked Learning pathways, described placing the pathways and the teacher common planning/prep periods first. Some said "band." Others said "A.P. courses." Still others reported scheduling full inclusion classes first, or football and cheerleading first, or singletons. Almost all considered the scheduling of singletons as one of their biggest challenges.

When asked how they addressed singletons, several master schedule coordinators and master schedule teams said that it depended on the complexity of the master schedule, size of the school, bell schedule involved, and other factors. They suggested that it was important to examine the master schedule to determine the percentage of courses that are singletons, and, if possible, find ways to reduce the number of singletons offered.

One master schedule expert, Mike Neubig, encourages schools to "reduce and prescribe." Ted Sizer, founder of the Coalition of Essential Schools, used to say, "the problem with the comprehensive school is that it's comprehensive." It is noteworthy that many of the schools known for excellence such as High Tech High have very simple bell schedules and all grade-level students take the exact same curriculum (including integrated math) for all or much of the day. Having a grade-level cohort of students who are enrolled in the same three to five courses with the same team of teachers enables interdisciplinary learning, project-based and inquiry-based approaches, and stronger adult-student and peer-to- peer relationships.

Some schools offer certain elective courses every other year and include information regarding this course rotation in the course catalogue so that students can plan accordingly. For example, two sections of psychology might be offered every other year rather than a single section of psychology each year. Other schools have reduced the number of elective courses that are not aligned with any particular pathway program of study. Many schools combine like courses and create concurrent sections.

If your bell schedule format supports alternating-day multiple sections then often the conflict matrix report is used to dovetail two courses with high numbers of student conflicts. For example, AP Language and Composition might be offered on the alternate day (B day) at the same hour/course period/time slot as AP U.S. History (A Day) since many of the same students registered for both these courses.

Keep in mind, too, that In the Linked Learning or wall-to-wall Academy context, there are several critical priorities that inform the master schedule building process. These include the need to schedule pathway students as an interdisciplinary cohort, to provide common planning time for pathway teachers, and often, to find a way to provide an additional coordination period for a pathway lead without compromising the "purity" of the interdisciplinary pathway team.

One suggested order for placing singletons, doubletons, tripletons, multiple section classes, and alternating day classes in the master schedule when the majority of courses are designed to be grade-level specific or upper house/lower house specific:

- Any and all locked singleton courses and locked doubleton courses with hard constraints (i.e., "forced placement, classes that must be taught at a certain time in a certain place)
- 2. Pathway cohort of classes with common planning period, taking care to balance blocks of classes with staggered common planning periods throughout the schedule. For example, the Health Academy/pathway may have a common planning period first period and an interdisciplinary program of study that meets periods 2-6. The Engineering Academy might have a common planning period 2 and an inter-disciplinary program of study that meets period 1 and periods 3 6. The Media Academy might have a common planning period during period 3 and an interdisciplinary program of study that meets in periods 1 & 2 and periods 4-6. The Law Academy might have a common planning period during period 4 and an interdisciplinary program of student that meets in periods 1-3 and periods 5 and 6, and so on.

Deciding on which periods to utilize for each pathway will be influenced by the bell schedule format chosen. For example, if a school is utilizing an 8-period A/B block schedule with even periods meeting on Tuesday and Thursday and odd periods meetings on Wednesday and Friday, a pathway team might wish to have four interdisciplinary courses scheduled on A or B day to maximize curriculum integration and flexible use of time.

- 3. All block singletons
- 4. All block doubletons
- 5. Senior Singletons (courses with the highest percentage of seniors first)
- 6. Junior Singletons (courses with the highest percentage of juniors first)
- 7. Sophomore Singletons (courses with the highest percentage of sophomores first)
- 8. Freshmen Singletons (courses with the highest percentage of freshmen first)
- 9. Senior doubletons (courses with the highest percentage of seniors first)
- 10. Junior doubletons (courses with the highest percentage of juniors first)
- 11. Sophomore Doubletons (courses with the highest percentage of sophomores first)
- 12. Freshman Doubletons (courses with the highest percentage of freshmen first)
- 13. Senior tripletons. Then senior classes with four sections. Then senior classes with five sections, etc. until the senior schedule is fully built and balanced.
- 14. Junior tripletons. Then junior classes with four sections. Then junior classes with five sections, etc., until the junior class is fully built and balanced.

- 15. Sophomore tripletons. Then sophomore classes with four sections. Then sophomore classes with five sections, etc., until the sophomore class is fully built and balanced.
- 16. Freshman tripletons. Then freshman classes with four sections. Then freshman classes with five sections, etc., until the freshman class is fully built and balanced.

A partial list of other considerations:

If a priority in the school is full inclusion of special education students, the scheduling team will want to pay attention to the placement of classes that will involve co-teachers (an academic or career technical teacher and a special education teacher-specialist) early in the process.

Similarly, if full inclusion of English language learners is a priority, an ELL teacher might be part of a pathway team or beginning ELL classes might be scheduled in alignment with one or more pathways to support integration of ELL students.

All students should have access to advanced courses.

Myriad Ways to Approach Building the Master Schedule

There are, of course, myriad ways to approach building the master schedule. One of our CCASN favorites occurs at Luther Burbank High School in Sacramento, California. Luther Burbank is a wall-to-wall pathway/SLC school of approximately 1761 students. Each year the school administration, counselors, SLC leaders, and department heads meet together and determine where in the schedule they will place "global" courses (those open to students from all pathways) and then each SLC, with a full cohort of dedicated interdisciplinary faculty, determines its own schedule. There are agreed upon policies that guide this work, experienced SLC lead teachers to mentor others in the scheduling process, and an administrator who provides oversight. The resulting schedule serves students well and results in purely scheduled pathway/SLC classes.

SLCs/Pathways at Luther Burbank High School include:

- Business and Information Technology
- > International and Environmental Studies
- Law and Social Justice
- Medical and Health Sciences
- Visual and Performing Arts
- Construction and Design