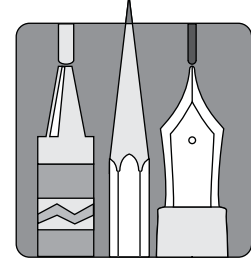# ONE

The Current Status of Block Scheduling

As the author works directly with educators in schools and school districts throughout the United States, the question about the number of schools on block scheduling is often asked. While this changes from year to year, the best estimate currently given is that about 72% of high schools use some form of block scheduling. This may range from the entire school on block to one grade or one subject.

The second question usually asked relates to the different block schedule designs being used. The author has counted at least 52 different designs. Most are similar and are variants of the two major designs, the 4 × 4, and the A/B, but include such names as modified, floating, rotating, progressive, etc. The design may not be as important as how the model is accepted and used.

TEACHER AND STUDENT PERCEPTIONS OF THE BLOCK SCHEDULE ■

Zepeda and Mayers (2006) reviewed several articles and numerous reports on block scheduling and found that a broad range of research has been conducted in a variety of settings and geographical areas with findings addressing perceptions and effects of organizing schools differently.

Teacher perceptions have been found to be basically positive despite some resistance to using block scheduling. For example, teachers have

reported improved interactions with students (Adams & Salvaterra, 1998), more planning and preparation time and less stress (Davis-Wiley, George, & Cozart, 1995), and more opportunities to use varying instructional strategies under block scheduling (Queen, Algozzine, & Eaddy, 1996). Additionally, researchers have consistently reported teachers' perceptions of positive discipline under block scheduling (cf. Canady & Rettig, 1995a, 1997; Queen, 2000), while Staunton (1997) noted that teachers with more years of teaching experience with block scheduling had more positive perceptions. Years of experience teaching on the block schedule was not found to be an important predictor of opinions in another study (Wilson & Stokes, 1999a). Poor communication from administrators, a lack of justification for changing, and general satisfaction with the status quo were among the reasons Corley (1997) identified for teachers' resistance to using block scheduling. Davis-Wiley, George, and Cozart (1995) found that teachers viewed professional development as essential to success and reducing regression effects often observed when innovative approaches are implemented in schools. Queen and Algozzine (2007) agreed and found that sustaining professional development was imperative for success.

Studies on student perceptions about the benefits of block scheduling have revealed generally favorable opinions (Hurley, 1997b; Pisapia & Westfall, 1997c; Salvaterra, Lare, Gnall, & Adams, 1999; Wilson & Stokes, 1999b, 2000; Zepeda & Mayers, 2006; Queen, 2008). Reports from high-achieving students were better than those of their lower-achieving peers (Merchant & Paulson, 2001). The perceived benefits of block scheduling for students project into the preparation for college and higher education as well as in simply doing better in the academic content being offered in high schools (Salvaterra, Lare, Gnall, & Adams, 1999). Not all findings were positive. For example, Oxford and Letcher (1995) reported "inconclusive" support from students about the benefits of block scheduling after the first year of implementation. Queen, Algozzine, and Eaddy (1997) found that over 80% of high school students felt positive about block scheduling after the first year. Of course, while perceptions are often powerful predictors of behavior, the benefits of block scheduling are better measured by changes in instructional practices and improvements in learning outcomes.

◼ THE EFFECTS OF BLOCK SCHEDULING ON STUDENT ATTENDANCE, BEHAVIOR, AND SUCCESS

Use of effective instructional practices to present the required curriculum and the changes that occur as a result of delivering instruction differently have also been studied. Some of the research has centered on what teachers do differently under block scheduling and other studies have focused on the difference changes in instructional practices have on attendance and student outcomes.

Teachers report having more time for different instructional objectives and increased opportunities to experiment under block scheduling options (Bryant & Claxton, 1996). In a study of more than 2,000 high school teachers

in North Carolina, Jenkins, Queen, and Algozzine (2002) found that the opinions of block schedule teachers about the use and appropriateness of a wide variety of instructional strategies were basically no different than those of high school teachers teaching in traditional schedules. The work supported previous reports on the importance of continuing professional development in bringing about change as a result of implementing block scheduling (Davis-Wiley, George, & Cozart, 1995; Queen, 2000; Queen, Algozzine, & Eaddy, 1996, 1997, 1998; Zepeda & Mayers, 2006).

Results related to discipline have been consistently positive (Zepeda & Mayers, 2006). For example, Evans, Tokarczyk, Rice, and McCray (2000) found that office discipline referrals decreased with successful implementation of block scheduling and these findings were consistent with those of Queen, Algozzine, and Eaddy (1996, 1997, 1998) who found that teachers spent less time on discipline where block scheduling was being used.

Studies of the effects of block scheduling on student attendance have produced inconsistent findings (Zepeda & Mayers, 2006). Positive outcomes (Duel, 1999; Khazzaka, 1998; Queen, Algozzine, & Eaddy, 1996, 1997, 1998) were countered with reports of no effects or problems with attendance in other work (Lare, Jablonski, & Salvaterra, 2002; Matthews, 1997; Pisapia & Westfall, 1997b; Weller & McLeskey, 2000).

To no surprise, the difference block scheduling makes in terms of student outcomes remains inconclusive. For example, while Snyder (1997) reported general improvements in state-mandated test scores and slight decreases on advanced placement (AP) exams, others reported consistent improvements on similar measures (cf. Evans, Tokarczyk, Rice, and McCray, 2000; Payne & Jordan, 1999). No significant generalized achievement effects were evident in the work of Duel (1999), Knight, DeLeon, & Smith (1999), and Lare, Jablonski, and Salvaterra (2002). Queen, Algozzine, and Eaddy (1996, 1997, 1998) found that performance on state-mandated tests increased after implementation of block scheduling. Queen, Algozzine, and Watson (2008) found in a 15-year longitudinal study of a school system composed of four high schools, that with continuous staff development, and monitoring and steadily increasing teacher-student interaction within the instructional process, student achievement can increase dramatically. (This study will be discussed more later in the chapter.) Most of the research on student grades and grade point averages reflects positive outcomes for block scheduling (Duel, 1999; Knight, DeLeon, & Smith, 1999; Snyder, 1997; Zepeda & Mayers, 2006). Dexter, Tai, and Sadler (2006) found little relationship between college students' reports of block scheduling use in high school and their performance in undergraduate science courses. Similar results were reported by Maltese, Dexter, Tai, and Sadler (2007).

PROMISES, PROVISIONS, AND PROVISOS FOR ■ BLOCK SCHEDULING IN THE HIGH SCHOOLS

Findings from the comprehensive review of literature of almost 60 studies and reports completed by Zepeda and Mayers (2006) indicate that knowledge about block scheduling is grounded in qualitative and quantitative

methods using perceptions, ratings, or scores from schools, administrators, teachers, students, and parents. The work has been completed in rural, suburban, and urban settings and some broad generalizations provide support for organizing school schedules using blocks of instructional time. While not without limits, this body of knowledge provides a further foundation of fundamental conclusions about the use and value of block scheduling. Teachers believe that they have more time to plan and prepare for classes under a block schedule (Duel, 1999; Hurley, 1997a; Jenkins, Queen, & Algozzine, 2002; Pisapia & Westfall, 1997a; Weller & McLeskey, 2000; Wilson & Stokes, 1999b). Block scheduling also provides increased opportunities to be more effective by varying instructional strategies, thereby engaging students to a greater degree; also, due to the increased length of the classes, more in-depth study of subjects is possible (Queen, Algozzine, & Eaddy, 1998). However, some concern has been voiced by college professors, perhaps not directly related to block, that students come to college with a broad knowledge of content but with minimum depth. This may be more related to the volume of standards to be covered rather than any high school scheduling designs (Queen, 2008). Overwhelming evidence shows that in the past more than 70% of teachers reported going beyond the lecture approach and used interactive instruction (e.g., Queen, Algozzine, & Eaddy, 1997). Queen (2008) reported that this percentage may decrease at times due to the pressure of added state and local standards related to content to be covered in class. School administrators and teachers also reported that block scheduling has a positive effect on school and classroom climate and requires less time spent on procedures, routines, and management (Canady & Rettig, 1995a; Payne & Jordan, 1996; Queen and Gaskey, 1996; Queen, 2000; Wilson & Stokes, 1999a). This offers teachers more instructional time for extended laboratory periods, small group investigation, or classroom inquiry and experiments. Similarly, more guided practice and extra time are available for skill enhancement in music, art, and vocational classes. Field trips to locations close to the school may be taken during one period. Of the greatest importance, we have experienced in hundreds of classrooms that the longer class period allows more time for interactive instruction using varied instructional strategies such as cooperative learning, inquiry, case study, seminars, and simulations and games, all of which can increase student interest and performance (cf. Jenkins, Queen, and Algozzine, 2002). In addition, most block schedule designs allow students to receive more individual attention and, in some cases, personalized instruction (Queen, 2008). Overall, from a close analysis of numerous studies and direct school and classroom analysis, most school administrators, teachers, students, and parents believe that block scheduling is effective (Zepeda & Mayers, 2006; Queen, 2008).

Discipline remains an important consideration in schools and can often be improved under the block schedule (Canady & Rettig, 1995a; Gunter, Estes, & Schwab, 1990; Hottenstein, 1998; Siefert & Beck, 1994). Historically, teachers throughout the United States have stated overwhelmingly the positive discipline results of being on the block (Canady & Rettig, 1995a; Queen, 2000, 2008). Students' attendance in class improves, and they are

less disruptive because of reduced time spent in changing classes. Additionally, students on the block are absent from class fewer times and usually have fewer classes to complete missed assignments. With block scheduling, students are usually able to take more classes, thereby broadening the scope of course selection. Students who were unable to take electives in a traditional schedule may be able to take the courses in the block model. In most states, credits required for graduation have increased (Queen, 2008). Despite its positive aura, or perhaps as a result of it, there are important cautions and lessons to be learned by studying the knowledge base on block scheduling. These caveats and directions also provide the groundwork for active and effective planning, implementing, and evaluating of block scheduling efforts. For example,

- Teachers were resistant to implementing block scheduling when there was poor communication provided by administrators (Corley, 1997).
- Teachers state that professional development is imperative but believe training has been insufficient for the successful implementation of block scheduling (Davis-Wiley, George, & Cozart, 1995); and for maximum success, teachers believe professional development must be of high quality and sustained over time (Queen and Algozzine, 2007).
- Few researchers report why schools move to a block schedule, the process undertaken to implement block scheduling, or the experiences of schools and school personnel in beginning or continuing a block schedule program (Zepeda & Mayers, 2006).

Creative and effective alternative scheduling practices emerge when parents, teachers, students, and administrators collaborate. Early in the transition, Hackmann (1995) suggested guidelines for implementing a block schedule, and Queen and Algozzine (2007) have modified and added to the list and clarified what we know about effective instruction.

1. Allow faculty, staff, parents, and students to have direct input in the decision process to move to the new model.

2. Develop a procedure for obtaining feedback from teachers, students, and parents on an ongoing and regular basis.

3. Develop, implement, sustain, and evaluate systemwide and schoolwide professional development opportunities for teachers in the areas of instructional pacing, instructional strategies, and instructional assessment.

4. Watch for teacher fatigue and stress, especially early and late in the semester.

5. Modify the scheduling process so that students take more challenging classes over the entire year, such as in an A/B or modified design.

6. Avoid starting with a negative effect for the second semester by eliminating the post-holiday down time of the exam period by

scheduling the fall semester so that either midterm or final exams can be completed before the holidays.

7. Continue to support and address the need for discipline with beginning teachers as an integral part of a block scheduling program.

8. Consider modifying selected courses to reduce risks inherent in certain content areas of instruction.
   a. Hire more language teachers so there is no great gap in time from the first to second levels of the subject; or
   b. Teach students in 90-minute periods of time for the entire year to create intensive courses that would meet requirements for advanced study.

9. School administrators need to monitor classrooms during the last thirty minutes of the periods to ensure that every possible minute is being used in an instructionally effective manner.

10. Review the skills that teachers identified as the most important for successful implementation of the block schedule. From interviews, surveys, direct observations, and working with educators from several school systems, the three most important skills or procedures to master are
    a. Develop pacing guides for each course for semester, weekly, and daily use.
    b. Incorporate or integrate standards/concepts within the pacing guides to gain a better sense of time management.
    c. Master several different instructional class designs and instructional strategies to vary ways in which materials are presented during the 90 minutes (or extended time), changing the classroom structure every 20 to 25 minutes (e.g., spend 10 minutes reviewing previous materials and setting the stage for what the students are going to learn. During the next 20 minutes, provide the background instruction/information that is needed to learn the content of the objective. In the next 30 minutes, have the students work in groups to experiment or gain an understanding of the content taught. Come back for large group discussion or group presentation for 20 minutes and then spend the last 10 minutes in review).

11. Share experiences with other schools that are using block scheduling on a regular basis, especially by content groups.

12. Adjust graduation requirements to accommodate additional and higher-level courses (e.g., increase requirements to 24 or 28 credits).

13. Obtain and maintain at least 80% support from every group involved and keep in mind that no group or organization gets 100% agreement, at least not all of the time.

14. Be aware that the high school has been resistant to change and remained fundamentally the same for the entire 20th century. Be sure of the reasons for any changes to be made and monitor closely for success.

15. Provide time for sustained professional development and monitor and evaluate for program and student success.

The extant knowledge base, then, illustrates the promises, provisions, and provisos in block scheduling but also points the way for additional research and ways to improve practices for block scheduling in the future.