Developing a Music Technology Lab

by Ms. Karen L. Garrett Green Acres Middle School, Birmingham, AL

- 1) Establishing the need for a lab.
- 2) Finding funds to start-up a lab.
- 3) Seeking help with computers and networking.
- 4) Finding the right keyboards and accessories.
- 5) Finding a software solution based on your needs.
- 6) Curriculum Samples and Lessons.

Music Tech Labs are becoming very popular across the U.S. Many students who are not traditionally in instrumental or choral programs may be extremely interested in creating music through other means. A music tech program is also great for introducing students to music theory and performance before taking instrumental or choral classes. Music students may also use a music tech class to create and compose their own music. Labs are configured to each classroom and the setup and funding available.

Funding is always an issue. Many organizations donate funds to schools, such as local government agencies, community groups and through fund-raisers. Other funding may be secured through grants or organizations like DonorsChoose.org. A book written by music technology teacher Tom Rudolph, 'Finding Funds for Music Technology' also describes ways to seek funding for a lab.

Link: http://www.soundtree.com/FindingFunds

The best way to secure computers is through the school system's Technology Dept. Much of the funding for computers comes from Title I each year. The computers are not always included when purchasing music lab equipment through music companies.

Choosing the right keyboard depends on whether or not they may be used in programs or concerts. A controller works with a computer as an input tool or to control other music devices. A regular keyboard has sounds built-in and may have speakers or can be connected to speakers and used for performances. Space is important also, in that controllers generally take up less space than full-sized keyboards.

Software for older students may include music theory, sampling / recording and music production. Examples are Pro Tools, Mixcraft or GarageBand, Alfred's Essentials of Music Theory, Sibelius / Finale and many online subscription based programs like MusicFirst and Noteflight. Curriculum materials are available in books such as SoundTree's Keyboard Lab Curriculum for Middle School and High School and Individual books like Fresh Beats - A Standards-Based Hip-Hop Curriculum. A few examples of these lessons will be posted in the handouts.

Some of the main companies that sell labs are SoundTree.com, Sweetwater.com and RomeoMusic.net. MusicFirst.com now has cloud-based software solutions for schools for an annual subscription rate. Below is an example of some of the items that might be used in a Music Tech Lab:

Book - Technology Strategies for Music Educators (by TI:ME) \$20	TECHNOLOGY (186 9 DOLG) About Alice floor The Company of the Com
Book - Alfred's Music Tech Series Teacher's Manual \$50 Playing Keyboard \$17 Sequencing and Music Production \$17 Composing with Music Notation \$17	Sequencing and Music Production Sequ
Book - Teaching Music with Technology by Tom Rudolph \$35	Music
Books - Alfred or other Basic Piano Library Books or Group Piano Methods (\$7-10 per book)	LOOK INSIDE! Lessur Book-Lesel Proprieta in a constant of the
Computers with speakers / printer - 1 per station / student	
Keyboards - 1 per station / student, approximately \$230 each or more with pedal and AC adapter. I use the (discontinued) Yamaha PSR-E403's.	THE THE STATE OF T
Group Education Base Teacher Controller - Yamaha \$3000, Korg \$2500+ (Student units are \$229 each) These prices vary a great deal between retailers.	Group Piano Lab 16 Students with Yamaha LC3 and Yamaha P95 LC3LAB2
Speakers or Amps if needed for extra sound output - approximately \$500 each (I do not have any of these)	THE STATE OF THE S

Headphones - \$20+ each	
Keyboard stands for programs - \$60 each	
Cases for transport (if needed) - approximately \$130 each	
Tables - QuikLok for computer and music keyboards - \$250 each	
Chairs - adjustable height chairs would be good	
Keyboard MIDI type or printer/USB cables - \$5-20 each	
Adapters/Splitters \$20-30 per station	
Microphones - \$10 for headphone type audio to \$70 for USB mics	
Security locks and cables if needed - \$30+ per station	
Projector - \$1500, not including SmartBoard /Promethean Board	-01
Software – Sibelius 7 (we paid \$1300 for upgrade for 10 computers for Sibelius 6)	Sildelling

Software – Sony Acid Music audio / loop software (approx. \$70 each) for PC or Acoustica Mixcraft (approx. \$60 each)	Music Studio 7 Craft 5 Multi-track Recording Studio
Optional software - Music Ace Maestro	MUSICACE MAESTRO State Experies The International Edition The Internation of the Intern
Optional software - Alfred's Essentials of Music Theory	The first and the state of the
Optional software - Alfred's SoundTree Keyboard Lab Curriculum for Middle School or High School. A Teacher Guide is available in the package, as well as a number of keyboard and theory books.	Keyboard Keyboard Keyboard Lab Durriculum Keyboard Lab Durriculum
Ink for printers - approx. \$30 per cartridge unless you are using the Board networked printers.	TA —
Any online subscriptions to sites would be an additional charge.	musicfirst