



Levy earned Tony and Drama Desk Award nominations for his work on *Oklahoma!*

A New Sound for *Oklahoma!*

By: David Barbour

A high-concept revival of a classic musical features a thoroughly up-to-date sound design

The current Broadway revival of Richard Rodgers and Oscar Hammerstein II's *Oklahoma!* looks and feels like no other. And it certainly sounds like no other.

The Rodgers and Hammerstein revival has been going strong for nearly three decades, with some of Broadway's greatest mid-twentieth century hits becoming once again appreciated for their groundbreaking

qualities. Until very recently, however, such productions have largely been canonical, at best making minor cuts and changes to the text and score. The current *Oklahoma!* has changed all that, stirring up a storm of praise and controversy, racking up awards, and striking a blow for the casting of disabled actors.

In a way, Daniel Fish's production returns *Oklahoma!* to its status as a

revolutionary piece of work. When the musical originally opened in 1943, it shattered Broadway norms, dispensing with such tired-businessman amenities as lines of fetching show-girls and star comedians hawking their pre-existing shticks. The authors borrowed some conventions of operetta, stripping the form of its more florid, bombastic qualities and adapting it to the American vernacular. Most crucially, they conceived a show that addressed real-world concerns: Ostensibly focused on the seemingly trivial issue of who will accompany Laurey, the heroine, to a barn dance, the action bristles with an undertone of



“The speakers that we’re using are much more powerful than we need for most of the show,” Levy says, “but we need that extra power for the dream ballet.”

violence, climaxing in an accidental killing. The comic subplot features the cheerfully promiscuous Ado Annie, who, with her unrepentantly man-collecting ways, is a kind of proto-feminist figure. (Ali Stroker, who uses a wheelchair, took home multiple awards for her performance.)

There’s also a deeper concern embedded in the script and score: Written in wartime, *Oklahoma!*—which is set in the territory of the title just before it achieved statehood in 1907—explores the tension between two visions of America: a collection of self-interested individuals versus a truly communal society. Before it, only one other musical—*Show Boat*, also written by Hammerstein—so fully probed an aspect of the national character.

Fish’s production—which began at Bard College in 2015, then moved to St. Ann’s Warehouse in Brooklyn last fall before arriving at Broadway’s Circle in the Square Theatre in April—stays true to the show’s letter while boldly reframing it into a mirror of American anxieties circa 2019. The action unfolds in a Laura Jellinek’s starkly designed barn interior, with plenty of guns hanging on the walls and, at the far end, a drawing of the Oklahoma plains stretching into the horizon. Terese Wadden’s costumes are thoroughly contemporary. Certain scenes take place in total darkness; the initial encounter between Curly, the hero, and

Jud, his romantic rival, is staged this way; later in the scene, their faces are projected, via video camera, in extreme close-up. (Lighting design is by Scott Zielinski; projection design is by Joshua Thorson.) The famed dream ballet, in which Laurey struggles to work out her attraction to both men and her fear of Jud’s brutal nature, has been transformed into a solo modern dance piece set to thrashing electric guitars. The climax alters the climactic knife fight, transforming Curly’s killing of Jud from an act of self-defense into something closer to second-degree manslaughter; this choice intentionally drains the final scenes (and the title tune) of their celebratory nature, exposing instead a defiant, frightened, society that can’t tolerate outsiders.

On the audio side, the score’s expansive orchestrations (originally by Robert Russell Bennett, with additions by William David Brohn for the most recent revival in 2002) have been replaced by Daniel Kluger’s bluegrass arrangements, orchestrated for an onstage band of seven. For sound designer Drew Levy, the challenges are many: A musical staged in-the-round, with an onstage band and a brief to keep the sound as natural as possible. With some careful thought and canny gear choices, he has managed to deliver exactly that.

Circle in the Square is a relatively low-ceilinged space located underground; it has hosted many musicals over the years, but it is hardly an ideal space for them. Peter Hylenski, sound designer for *Once on This Island*, the theatre’s previous tenant, told *Lighting&Sound America*, “It’s a great space for playing a show, but it’s very awkward in terms of its geometry for a sound system.” He added, “The system ends up hanging very high; the closer you get to the performers, the more overhead the speakers become, which makes it difficult to image a voice back down to the actor. The farther back in the room you are seated, the more the speakers can fire toward you rather than above you.”

By contrast, Levy says, “The production at St. Ann’s was the most diffi-

cult incarnation,” because of its correspondingly vaster volume, including high ceilings that threatened to disperse the sound altogether. Also, the set at St. Ann’s consisted of a plywood box that proved to be wildly reverberant. Not that the task was easy at Circle in the Square, especially with the band located at one end of the stage, in front of the vomitory through which the cast enters. “How do you maintain the right audio balance, when the band is so present?” he says. “The big concern was keeping a natural feel, so it doesn’t sound amplified. At Circle in the Square, a good chunk of the seating is behind the band, which wasn’t the case at St. Ann’s. To deal with this, we have a lot of speakers for what is a relatively small space.”

Indeed, Levy has nearly 100 speakers in his rig. “We have three U-shaped rings,” he notes, all filled with gear from d&b audiotechnik. The first ring features the company’s Y10P two-way passive point source units; the next ring contains T10 two-way boxes with rotatable horns; and the third ring sports E8 two-way compact coaxials, the latter used to reach the area upstage of the vomitory. A separate ring is fitted with d&b V-SUBs. In addition, Levy has Meyer Sound UPJuniors for his surround system and Meyer 1100-LFCs for additional low end. “I would have loved to have some front fills, too,” he says, adding that this wasn’t practical, since the stage is surrounded with picnic tables—dotted with crock-pots, as a chili dinner is served at intermission—on which performers sometimes dance.

“The speakers that we’re using are much more powerful than we need for most of the show, but we do need that extra power for the dream ballet,” Levy notes. “Using larger loudspeakers, we also get more control, which helps with reinforcement. Circle in the Square demands a lot of speakers because of the space’s geometry; with this speaker layout, we’re spreading energy as much as we can horizontally, while also controlling it vertically. The key is we don’t want it to spill too much on to the stage.”

Playing a crucial role in controlling the placement of the sound is Soundscape, d&b's new object-based spatialization tool. The system consists of two elements. First, d&b En-Scene is a positioning tool that allows the individual placement and movement of up to 64 sound objects. It accurately depicts stage scenarios so that each sound object corresponds both visually and acoustically to the live source. Second, d&b En-Space is an in-line room emulation tool that creates and modifies reverberation signatures derived from acoustic measurements of seven internationally renowned performance venues, which are convolved within the audio processor. This system addresses the voice-imaging challenge that Hylenski mentions above. "We're using En-Scene to manually track the actors all around the space," Levy says. "That's how we maintain the clarity, so the sound always appears to be coming from them. It's all preprogrammed; it helps that Daniel [Fish] is specific in his blocking. We use QLab to drive En-Scene; there was a fair amount of actual scripting and coding that went into making it viable in our workflow. I and my programmer spent a lot of time at St. Ann's, and we refined it for Broadway. The dream ballet took 12 – 16 hours of programming alongside Dan Kluger, over many days."

Interestingly, Levy adds that he added very little foldback, "only for a few tricky moments, including when three women in the cast need to blend in harmony at the far end of the stage." He also credits Kluger for writing spare orchestrations "that help get the voices out. He was very keen on making sure that you could hear every note; he and I worked very closely. Certainly, on the dream ballet, it was the two of us mixing together in the space."

The cast members are fitted out with Sennheiser MKE1 mics, SK 5212 wireless body packs, and EM 3732 receivers. The MKE1s, he notes, were chosen "because we needed something that is super-clear, and Daniel didn't want to see mics and the MKE1s are so tiny. I also worked with Terese, the costume designer, to hide

the RF gear as much as possible. The musicians are equipped with DPA d:vote 4099 mics, plus two Sennheiser e 609s for the electric guitars.

"And anything that can be done direct, is, including the accordion, which has a mic system built in," he adds. The show is run on a DiGiCo SD10T console. "I like DiGiCo consoles in general," Levy says, "and the SD10 fit what we were doing. Also, it has to fit in a booth, where the show is mixed." The booth has an open window, but to help the sound engineer

allows Damon Daunno and Rebecca Naomi Jones, as Curly and Laurey, to adopt a studied casualness in their scenes of flirting and it leaves room for Patrick Vaill, as Jud, to project a quiet sense of menace. And in keeping with the new, more contemporary orchestrations, it provides space for more naturalistic singing styles.

Other audio personnel on the production include Sam Lerner (associate sound designer), Tony Smolenski IV (production sound), Sam Schloegel (sound programmer), John Sibley



The band is located at one end of the stage, in front of the vomitory through which the actors make their entrances.

hear the shows, a tiny Soundscape system has been installed. (Outboard gear on the console includes TC Electronic 6000 and 4000 units.)

Overall, here's how the control system works: The SD10T sends MIDI signals to QLab, which sends OSC commands to the DS100 signal engine, which in turn drives the Soundscape functioning. "We spent a lot of time programming the infrastructure so that we could move quickly in rehearsal." Levy says. "It was time spent creating a bunch of macros within QLab that enabled us to work quickly in rehearsal." The system works beautifully in this application: It

(head sound engineer), and Bridget O'Connor (assistant sound engineer). Gear was supplied by Sound Associates.

It is a paradox of modern sound design that a natural seemingly unamplified sound requires more gear than ever. But the implementation of large-scale loudspeaker rigs, combined with a spatialization system like Soundscape, allows Levy to work in an intensively detailed way that wasn't possible even a few years ago. Using the approach, the combined goal of transparency and intelligibility is possible, making this production innovative in more ways than one. 📶