A diverse set of musical practices that gained momentum in the middle of the 20th century, characterized by its radical opposition to and questioning of institutionalized modes of composition, performance, and aesthetics.

1. Definitions.

Initially a predominantly American phenomenon, the varied music styles that have been called experimental do not share one defining compositional characteristic. On the contrary, the experimental label has encompassed a wide array of music: from the indeterminacy of John Cage to the completely determined music of early minimalism, from the singular event pieces of George Brecht to La Monte Young’s eternal music, and from the anarchic theatricality of a Fluxus “happening” to the focused collective serenity of Pauline Oliveros’s *Sonic Meditations*. Sharing a rejection of musical institutions and institutionalized musical values, experimental composers worked outside the European art music mainstream, finding an alternate path to the then-sanctioned choice between neo-classicism and serialism. Although there have been fruitful interactions between experimentalism and modernism (most notably in Cage’s seminal appearance at Darmstadt in 1958), experimental music has frequently been defined in opposition to the values and aesthetics of the modernist avant-garde. David Nicholls, for one, has drawn the line between the “experimental” and the “avant-garde” by its relationship to the mainstream: avant-garde composers work at the extremities of a musical tradition, whereas experimentalists worked outside of that tradition completely. As a result, experimental music displays musical values that stand in opposition to the music of the modernist avant-garde: chance procedures instead of total control, graphic scores and written instructions instead of conventional musical notation, radical simplicity instead of complexity, and unorthodox performance requirements instead of traditional notions of virtuosity.

Experimental composers resisted the status quo and rejected some of the fundamental assumptions about music, including the defined roles played by composers, performers, and audience members, and even the very nature and purpose of music itself. In the process, experimentalists have succeeded in blurring and even erasing some established boundaries between music and noise, music and other art forms, and art and everyday life. At the same time, experimentalist maintained a suspicious distance from musical institutions and institutionalized musical value by producing music impervious to traditional modes of analysis and understanding. As a result, experimental musicians initially found more sympathy and support from practitioners in other art forms such as dance (for example, Cage’s and David Tudor’s many collaborations with choreographer Merce Cunningham) and the visual arts (for example, the early performances by the Philip Glass Ensemble took place more often in galleries, lofts, and museums than traditional music venues).
The figure of John Cage is central to any notion of an experimental music, not least for the fact that he was one of the first composers to embrace and define the term. In his landmark essay “Experimental Music” (1957), Cage accepted the designation to describe both his own music and also music he liked and to which he felt an affinity. Cage outlined two important conditions crucial to the formation of an experimental aesthetic. First, he underscored the importance of creative use of technology, which has remained significant to the experimental tradition. In particular, he argued that magnetic tape, which became widely available after World War II, fundamentally transformed the way music can be made and experienced: it forces composers out of their ingrained musical habits by allowing for various novel ways to manipulate and combine sound, and encouraging new ways to notate and experience time. Tape also motivated experimental composers to think of music as a series of parts rather than one coherent score, changing the acts of composition and performance.

Second, Cage’s definition argued that music consists of sounds that are both intentional (notated by the composer) and unintentional (environmental). Experimental composers not only have acknowledged the latter but have embraced it, demonstrating a willingness to relinquish control over sound. This radical new mode of creation also facilitates a new kind of listening where audiences pay attention to any or all sonic activity, rather than constrain themselves to the mode dictated by the composer.

Cage’s seminal collection of essays Silence (1961), serves as both a central statement of experimentalism and the most influential text for younger generations of experimental composers. Silence contains a provocative mix of writings about compositional technique (“Indeterminacy”), the nature of experimentalism (“History of Experimental Music in the United States”), and influential composers and artists (including Erik Satie, Edgard Varèse, and Robert Rauschenberg). Cage also published more performative texts, including “Lecture on Nothing” (based on a set rhythmic structure), and “Composition as Process” (a four-column lecture designed to be recited along with Music of Changes).

Michael Nyman builds upon Cage’s ideas in his thorough classification of experimental music. Using Cage’s 4’33” as the quintessential experimental example, Nyman points to new modes of notation, radically different temporal approaches, and new challenges to performers and listeners as markers of a broader experimental attitude. Most significantly, Nyman argues that experimental music fundamentally changed music’s ontology. Rather than creating works with a “defined time-object,” experimental composers engage with a series of processes that can result in radically different results every time a piece is realized. An experimental score no longer represents a fixed structure fleshed out with full musical details; instead, it offers instructions that set up possibilities for certain events to occur. Music is no longer an object, but a process. Nyman classified the following types of experimental processes: chance process (such as the use of paper’s imperfections as part of the compositional procedure in Cage’s Music for Piano, 1952–6); people process, including pieces in which each performer is directed to move at her or his own speed through the provided material (such as Feldman’s Piece for Four Pianos, 1957); contextual process, by which performers’ decisions are made based on particular situations they encounter as they play the piece (such as Alvin Lucier’s Vespers, 1968); the repetition process of Minimalism (USA); and electronic processes (such as David Behrman’s Runthrough, 1970).
While Cage and Nyman pointed to musical characteristics in their definitions of an experimental aesthetic, others have described experimental music in terms of its historical moment. In 1963, Leonard B. Meyer identified a historiographic crisis in music. Preferring to use the term “avant-garde,” he pointed to the then-infamous use of chance and indeterminate procedures by Cage and contemporaries as a signal of the “end of the Renaissance.” Unlike composers of earlier traditions, whether Bach or Bartók, who relied on goal-directed compositional logic and created teleological listening expectations, the use of aleatoric techniques resulted in what Meyer identified as an anti-teleological music of experimentalism. The loss of an ability to predict musical form also marked the end of the monolithic trajectory of music history. Georgina Born similarly recognized experimental music’s decisive break from the modernist narrative by declaring it the “centerpiece of musical postmodernism.”

While experimental music shares some defining characteristics with earlier developments in rock and jazz, most notably technological experimentation and real-time performances, experimental musicians have been largely reluctant to acknowledge such a debt or influence. Prevailing definitions of experimental music have therefore addressed a predominantly white set of composers and practices. George Lewis has been the most significant commentator to expand “experimental” to include jazz, positioning Charlie Parker alongside Cage as the two leading figures in American experimental music in the 1950s.

2. **Influences.**

Experimental music did not come out of a singular linear history, and instead drew influences and found resonances with a wide variety of earlier composers and traditions. First and most importantly, experimentalists formed an affinity with the long tradition of maverick American composers who, either in actuality or legend, turned their backs on the prevailing European tradition and forged their own often autodidactic paths. Three in particular have played important roles in the development of American experimentalism: Charles Ives (1874–1954) and Henry Cowell (1897–1965), and Cowell’s French-born colleague Edgar Varese (1883–1965).

The significance of Ives to the history of the experimental tradition lies in three main areas. First, he established a legacy as the first of what Cowell would call an “indigenous American composer.” Ives did receive formal composition training and worked as a professional organist for 14 years, but he did not follow the path of most American composers of his era by going to Europe to study music. This, and Ives’s unusual compositional career, puts him outside the dominant European-ized mainstream of American music. Second, Ives’s use of radical techniques gained more widespread attention from the 1920s just as the next generation of American experimental composers came of age. Ives’s music is notable for his use of extreme dissonances, ensembles playing in different spaces in different tempos, the use of microtones, and experiments in polyrhythms and polytempos. The second movement of his Fourth Symphony, for example, uses two conductors as well as two pianos playing instruments tuned a quarter tone apart. “The Housatonic at Stockbridge” from *Three Places in New England* includes a passage in which the orchestra is playing competing meters of 6 versus 8 versus 10 versus 26 2/3. Third, Ives’s financial success in the insurance business enabled him to provide financial support for new music.
Henry Cowell was an early supporter and promoter of Ives’s music and recipient of Ives’s patronage. He became what Cage called the “open sesame for new music in America” through his role in promoting younger composers and lesser-known works. *New Musical Resources*, a book he wrote in 1917–18 and published in 1930, is one of the seminal books on 20th-century music. Taking the overtone series as his prime inspiration, Cowell proposed radically novel musical material in all facets of music including harmony and counterpoint, and form. In a particularly influential section on rhythm, he detailed his invention of a rhythmic notation that divides the whole note into fifteen equal parts, a system he used in a number of his pieces, including the *Quartet Romantic* (1915–17). Cowell’s occasional unorthodox use of traditional instruments would find resonance in later experimental compositions. Examples include *The Banshee* (1925), a piano piece in which all sounds are made inside the instrument.

Varèse’s legacy has been claimed by both the experimentalists and the modernist avant garde. Cage has identified him as the composer of his generation who had the most influence on postwar experimentalism. Varèse pointed the way to a musical language that could bypass both the old consonance/dissonance relationships found in tonal music, and the serialism/neo-classicism choice facing postwar composers. Instead, Varèse accepted all sounds as musical material, no longer subscribing to the dividing line between music proper and mere noise.

Perhaps the most important European influence on American experimentalism is Erik Satie (1886–1925), whom his champion Cage called “indispensable.” Working outside the prevailing the Austro-Germanic tradition, Satie explored alternate functions for his music, such as his proto-ambient *Musique d’ameublement* (*Furniture Music*, 1918–1923). Comparing it to conversation, art, or a chair, Satie intended this music to blend into the environment and play a similar role to light or heat in a room. Decades before minimalism, Satie explored the possibilities of extreme repetition in *Vieux sequins et vieilles cuirasses* (1913), which ends with 380 repeats of an 8-bar passage. More famously, *Vexations* (1893), consists of 52 notated beats, made up of four varied repetitions of 13 beats. Satie’s cryptic instructions have been interpreted to indicate that performers should repeat the score 840 times. The facsimile score was first published in the United States in 1958. Five years later, Cage organized the first-ever performance given by a rotating roster of musicians including David Tudor, Christian Wolff, John Cale, and Cage himself.

3. **Characteristics.**

In finding alternatives to the modernist avant-garde’s increasingly controlled and complex music, experimental composers explored a wide array of often-contradictory options. Most notoriously, Cage and other experimentalists abandoned stringent authorial control over their pieces altogether, with Cage arguing that an experimental action is one in which the outcome is unknown. The use of chance facilitated this radically new experimental aesthetic. In Cage’s *Music of Change* (1951) for example, he used the *I Ching* (an ancient Chinese oracle) to determine pitch, sonority, rhythm, tempo, and dynamics. Experimental composers further opened the identity of a piece of music by the use of indeterminacy, that is, by allowing certain decisions to be made by the performers before and/or during a performance of the work. Such choices range from size of ensemble and instrumentation, to decisions that can affect the overall structure of the music. In extreme cases such as Cage’s *Variations II* (1961), where performers decide on every parameter of a sound event by the use of transparencies, different renditions of the same score can produce results that have no musical facts in common.
Searching for new ways to introduce elements of indeterminacy has led some experimental composers to expand the nature, possibilities, and function of musical scores. Often abandoning traditional specialized musical notation, experimentalists work with graphic scores, written instructions, and other unorthodox means, resulting in documents that no longer represented specific sounds and musical structures. An early, extreme example is John Cage’s 4’33” (1952), where the score consists solely of a division into three movements (“I,” “II,” and “III”) each followed by a single word “TACET.” An accompanying note describes the premiere performance by pianist David Tudor, and indicates that the piece may be performed by an instrument or combination of instruments, and may last any length of time.

Non-traditional scores can give performers greater interpretive roles. Earle Brown (1926–2002), for example, started experimenting with graphic notation in the early 1950s as part of an attempt to free performers from overly prescriptive directions. *December 1952*, from Folios (1952–3) is a single sheet of 12” by 16” card stock. The score consists solely of lines and rectangles of varying sizes. Despite the presence of Brown’s signature and date at the bottom left-hand corner, the score may be read from any of the four sides. The accompanying instructions offer no details as to how one should interpret the score, leaving possible performances with different pitch and rhythmic content, with different interpretation, and of different lengths. Brown later called *December 1952* an “activity” rather than a “piece” because the performers supply the content.

Christian George Wolff moved from graphic scores to pieces with no pictorial elements, where instructions are completely written out. In *Play*, for example, Wolff provides the range of sound possibilities for the performers, from the number of occurrences (“One, two, three, four or five times play a long sound of complex of sequence of sounds”), to general rhythmic guides (“Allow various spaces between playing É”), to the presence of electronics (“At some point or throughout use electricity”). Typical of Wolff, indeterminate processes are built into the performance as the performers are directed to interact and make decisions as the piece progresses by coordinating their actions with others.

While indeterminate and aleatoric pieces abandoned modernism’s intention and control, they can result in a level of complexity rivaling that of the avant garde. (Cage’s *Music of Changes*, for example, is a notoriously complicated work to perform.) Experimental music also included styles at the other end of the spectrum: the repetitive music now known as minimalism feature a high level of control and compositional intent, but used in conjunction with deliberately simple musical material. After exploring conceptualism with Fluxus, La Monte Young return to the long tones he had worked with in his *Trio for Strings* (1958). In 1964, Young started working on his theoretically timeless *The Tortoise, His Dreams, and Journeys*. Using electronics to sustain one drone, Young and other members of the Theater for Eternal Music play predetermined frequencies against the constant tone. The music forms a permanent part of the environment of Young’s Dream HouseÑan ongoing sound and light environment. Other composers to explore extended tones include Terry Jennings (1940–81), Phil Niblock (b 1933), and Charlemagne Palestine (b 1945 or 1947). The more well-known motoric form of minimalism started with Terry Riley’s landmark *In C* (1964), a repetitive piece in which performers move through melodic cells at their own pace. Early pieces by Steve Reich and Philip Glass exemplify the new determinism found in some experimental music. Both used a singular process to structure entire lengthy pieces: Reich using phasing (for example, *Come Out* and *Piano Phase*), and Glass subjecting modular melodies to additive and subtractive processes (for example, *2 Pages* and *Music in Fifths*).
Just as it expanded the boundaries of composition, experimental music has likewise broadened the range of legitimate musical actions in the realm of performance. Instead of restricting performance activities to those that require years of formalized training, experimental pieces have required performers to move pieces of furniture (Young, Poem for Chairs, Tables, and Benches, Etc. or Other Sound Sources), swing suspended microphones (Reich, Pendulum Music), and burn an instrument (Annea Lockwood, Piano Burning). This has allowed participations in experimental pieces from performers with little or no musical training. At the other extreme, some types of experimental music demand a new kind of virtuosity. Minimalism, for example, requires the kind of highly precise, mechanized, and synchronized performances perfected by such specialist ensembles as Steve Reich and Musicians, and the Philip Glass Ensemble.

With the advent of indeterminate compositions, performers play a more significant role in realizing experimental pieces. Participants make decisions prior to and/or during performances that can determine details from sound-to-sound events to the overall length and structure of the piece. Brian Eno has identified as a defining characteristic of experimental music the fact that its scores are not geared towards producing specific results (as one finds in both traditional western art music and the avant garde), but rather suggests a wider range of acceptable possibilities. Although musicians such as pianist David Tudor and cellist Charlotte Moorman have played integral roles in the development and performance of experimental music, performers have (often as a matter of necessity) also become expert performers of their own music.

Performances of experimental music often demand actions from performers that eschew traditional notion of virtuosity. Indeed, a number of experimental composers actively repudiated the idea that music making should be within the purview of an elite few, turning instead to situations that can encompass performers with a range of aptitude. Few have sought to eradicate the division between performers and audience, and to rethink the social purpose of music-making as radically as Pauline Oliveros. This is most evident in her Sonic Meditations. Developed out of an earlier interest in drones, Sonic Meditations are group activities which may or may not involve sound. Preferring “articulated” over “composed,” Oliveros provides written instructions that range from a brief question—“What constitutes your musical universe?” (XXI)—to more detailed instructions on how to tune one’s singing gradually to the rest of the group (XVI). Oliveros intended the Sonic Meditations not as traditional performances, but group activities that can include every person in the room, even non-musicians. In fact, she states that people without formal musical training may be better equipped to participate in the mediations because prior musical education can act as a hindrance. Other groups invested in inclusive performances include Musica Elettronica Viva, for whom audience involvement was an important political statement against elitist nature of traditional concerts.

Experimental musicians also participated in events that blurred boundaries between music and other art forms. Fluxus, for example, included musicians such as Young, Yoko Ono, and Philip Corner, poet Jackson MacLow, as well as dancer/choreographer Simone Forti. As a result, events featured a mix of art, dance, performance arts, electronics, and music. Instead of combining different art forms to produce multi-media events, Fluxus was more interested in what Dick Higgins called “intermedia” experiences, that is, activities that fall in between traditionally demarcated arts forms. Fluxus also worked to erase the line between art and life. Brecht, a painter as well as composer, staged a series of “event pieces” in which he turned common everyday activities, such as pouring water (Drip Music) or answering the telephone (Three Telephone Events), into performative activities. These event pieces
contain only instructional text, with nothing resembling traditional musical notation. Performance in front of an audience is not specified, thus leaving open the possibility that these events can act as organized ways of experiencing everyday life.

Rejecting entertainment and education as art’s foremost achievements, Fluxus created experiences that serve as stimuli for participants and spectators, resulting in more meaning in their life and works. Dick Higgins has suggested that qualities such as boredom and danger, generally unwelcomed in the arts, play central roles in this new aesthetic. Deliberately long and boring works such as Young’s Composition 1960 # 7 (a solitary perfect 5th that should be “held for a long time”) might initially inspire resentment and dissatisfaction from the audience. After prolonged exposure, however, its effect may lead to meditation, acceptance, and even enjoyment. Higgins himself wrote a series of Danger Musics (1961–3), which demanded such actions as shaving one’s head (#2), screaming until one loses one’s voice (#17), and crawling up the vagina of a living female whale (#5, attributed to Nam June Paik). The possibility of endangering oneself and/or the spectators either physically or emotionally (for example, Yoko Ono’s Cut Piece) created a particularly intense artistic experience with a heightened sense of risk. Like boredom, danger also enriches how one experiences the world.

Experimental music shares with its modernist counterpart a fascination with technology. Their usage, however, differs markedly. Because experimental composers rarely had the institutional access to large electronic music labs and equipment, they often adapted a more pragmatic approach, including using “failures” such as feedback and portable forms of technology (including amplifying instruments made from found objects with contact microphones) which they incorporated into live performances. This allowed them to use electronics as new sound sources, as an instrument in pieces with unspecified instrumentation, and as the basis for electronic processes. Prominent experimental performance ensembles built around the use of live electronics include Musica Elettronica Viva (MEV), founded by American composer/performers Frederic Rzewski, Richard Teitelbaum, and Alvin Curran in Rome in 1966; and Sonic Arts Union, founded in the same year by Alvin Lucier, David Behrman, Gordon Mumma, and Robert Ashley composers who had all been associated with the ONCE Festival in Ann Arbor, Michigan. In his own compositions, Lucier used electronics to explore common but concealed acoustic phenomenon.

Some experimental composers have explored alternate tuning systems than the one used in European art music. Harry Partch, for example, composed all his mature works for a 43-pitch scale. Influenced by his encounter with Hermann Helmholtz’s On the Sensations of Tone in his early twenties, Partch came to the belief that the European system is an “acoustic lie.” His own scale, which combines perfectly consonant intervals with pitches not found in European art music, necessitated new instruments. Partch built over two dozen in his career, including a kithara (his 72-string version of the ancient Greek instrument), a chromelodeon (a harmonium built to play in the 43-note scale), and cloud-chamber bowls (glass bottles that are played with a mallet). Other composers who have used just, microtonal, and other forms of tuning include Arnold Dreyblatt and Lou Harrison (both of whom also invented new instruments), Young, and Ben Johnston.

Important experimental theatrical pieces include Robert Ashley’s television operas and Philip Glass’s monumental collaborations with Robert Wilson. Other instances of experimental music’s reach into other artistic media include performance art (for example, Laurie Anderson, Meredith Monk, and Pamela Z), and sound and video installations (for example, Lucier and Christian Marclay). (See also Experimental music theater and Sound art)
The impact of experimental music was quickly felt outside of the confines of the American avant garde. In Europe, it found sizeable institutional support in West Germany, and inspired a significant group of English experimentalists (including Cornelius Cardew, Gavin Bryars, John White, and Howard Skempton). Experimental techniques also found their way into popular music in such bands as the Velvet Underground (whose early drone-based songs showed the influence of John Cale, a one-time member of Young’s Theater of Eternal Music), Sonic Youth, and in the works of such composers as Glenn Branca, who scored his symphonies massed electric guitars.

The outsider status of experimental music proved short-lived, with a significant number of composers finding a successful place in academia, recital halls, and even popular culture. From what was initially a motley assortment of techniques and styles, experimental music has forged its own canon and it now represents another type of tradition to which composers can subscribe.

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