STATE OF MICHIGAN

COURT OF APPEALS

NATIONAL WILDLIFE FEDERATION, YELLOW DOG WATERSHED PRESERVE, INC., KEWEENAW BAY INDIAN COMMUNITY, and HURON MOUNTAIN CLUB, FOR PUBLICATION August 12, 2014 9:05 a.m.

Petitioners-Appellants,

V

DEPARTMENT OF ENVIRONMENTAL QUALITY and KENNECOTT EAGLE MINERALS COMPANY,

Respondents-Appellees.

Before: CAVANAGH, P.J., and OWENS and STEPHENS, JJ.

PER CURIAM.

Appellants appeal by leave granted from the circuit court's order affirming the decision of the Department of Environmental Quality to grant a groundwater discharge permit to the Kennecott Eagle Minerals Company in connection with the latter's plan to develop an underground mine to extract nickel and copper from the sulfide ores beneath the headwaters of the Salmon Trout River in the Yellow Dog Plains in Marquette County. We affirm.

I. FACTS

In February 2006, Kennecott Eagle submitted applications to the DEQ for a nonferrous metallic mining permit and a groundwater discharge permit. The DEQ consolidated the applications for public hearings. In December 2007, the DEQ issued mining and discharge permits to Kennecott.

Appellants requested contested case hearings on both permits. Appellants' major concerns were that the mine might collapse, and that operations would produce excessive acid

No. 308366 Ingham Circuit Court LC No. 11-000158-AA rock drainage,¹ either of which would result in serious damage to the area's environment and natural resources, including the Salmon Trout River. The contested case proceedings progressed through the administrative law judge's proposal for decision to the final decision-maker's January 14, 2010 final determination and order, which adopted the proposal for decision but for minor adjustments, and granted the permits.

Appellants sought judicial review in the circuit court, which, in a lengthy and detailed opinion and order, affirmed the DEQ in all regards. This Court granted leave to appeal in an unpublished order entered August 7, 2012.²

II. STANDARDS OF REVIEW

The circuit court's task was to review the administrative decision to determine if it was authorized by law and supported by competent, material, and substantial evidence on the whole record. Const 1963, art 6, § 28; MCL 24.306(1). An agency decision is not authorized by law if it violates constitutional or statutory provisions, lies beyond the agency's jurisdiction, follows from unlawful procedures resulting in material prejudice, or is arbitrary and capricious. *Northwestern Nat'l Cas Co v Comm'r of Ins*, 231 Mich App 483, 488; 586 NW2d 563 (1998).

"[W]hen reviewing a lower court's review of agency action, this Court must determine whether the lower court applied correct legal principles and whether it misapprehended or grossly misapplied the substantial evidence test to the agency's factual findings." *Boyd v Civil Serv Comm*, 220 Mich App 226, 234; 559 NW2d 342 (1996). "This latter standard is indistinguishable from the clearly erroneous standard [A] finding is clearly erroneous when, on review of the whole record, this Court is left with the definite and firm conviction that a mistake has been made." *Id.* at 234-235.

A tribunal's interpretation of a statute is subject to review de novo. *In re Complaint of Rovas*, 482 Mich 90, 102; 754 NW2d 259 (2008). Likewise a tribunal's interpretation of an administrative rule. *Aaronson v Lindsay & Hauer Int'l Ltd*, 235 Mich App 259, 270; 597 NW2d 227 (1999). A tribunal's evidentiary decisions are reviewed for an abuse of discretion. See *Price v Long Realty, Inc*, 199 Mich App 461, 466; 502 NW2d 337 (1993).

Unpreserved issues, however, are reviewed for plain error affecting substantial rights. *Kern v Blethen-Coluni*, 240 Mich App 333, 336; 612 NW2d 838 (2000).

¹ According to expert testimony, a project of this sort involves excavating large quantities of rock that, when exposed to oxygen and water, generates sulfuric acid. The parties agree that the hazard of acid rock drainage inherent in this project necessitates careful management.

² As noted, this appeal relates only to the decision to grant the groundwater discharge permit. The decision to grant the mining permit is the subject of this case's companion, *Nat'l Wildlife Federation v Dep't of Environmental Quality*, ____ Mich App ___; ___ NW2d ___ (Docket No. 307602, issued 2014).

III. SCOPE OF CONTESTED CASE PROCEEDINGS

Appellants argue that the administrative law judge erred in allowing the introduction of new evidence in the contested case proceedings, or otherwise in treating the contested case as an extension of the original process of deciding the permit application. Appellants suggest that the original application proceedings leading up to the initial decision to issue the groundwater discharge permit should be deemed a completed adjudication, with the contested case proceedings that followed then serving as the first stage of appellate review, which for that reason should have proceeded with a conservative approach to taking new evidence. The DEQ and circuit court rejected this argument, as do we.

Section 1701 of the Natural Resources and Environmental Protection Act authorizes the circuit court to grant "declaratory and equitable relief against any person for the protection of the air, water, and other natural resources and the public trust in these resources from pollution, impairment, or destruction." Section 1704(2) adds that, where "administrative, licensing, or other proceedings are required to determine the legality of the defendant's conduct, the court may direct the parties to seek relief in such proceedings." Section 1704(4) states, "If judicial review of an administrative, licensing, or other proceeding is available, . . . the court originally taking jurisdiction shall maintain jurisdiction for purposes of judicial review."

Water resources protection falls under Part 31, MCL 324.3101 to MCL 324.3133, of the Natural Resources and Environmental Protection Act.³ MCL 324.3103(1) states that "[t]he department shall protect and conserve the water resources of the state and shall have control of the pollution of surface or underground waters of the state and the Great Lakes, which are or may be affected by waste disposal of any person." Section 3106 states that "[t]he department shall establish pollution standards for lakes, rivers, streams, and other waters of the state ... [and] shall issue permits that will assure compliance with state standards to regulate municipal, industrial, and commercial discharges or storage of any substance that may affect the quality of the waters of the state." Subsection 3112(1) states that "[a] person shall not discharge any waste or waste effluent into the waters of this state unless the person is in possession of a valid permit from the department." Subsection 3113(3) authorizes "the permittee, the applicant, or any other person" to file objections and request a contested case hearing in accord with the Administrative Procedures Act.⁴

These statutory provisions collectively set forth avenues for the DEQ to arrive at a single final decision on a permit application: agency review of extensive application materials subject to broadening with a contested case when an applicant or third party persuades the agency that the additional procedure is warranted.

Appellants' interpretation of those provisions as establishing an initial agency decision as a final order with the contested case functioning as appellate review is a strained one. This is

³ MCL 324.101 *et seq.*

⁴ MCL 24.201 *et seq.*

particularly so considering that MCL 324.1704(2) encourages judicial deference to administrative proceedings where required, and MCL 324.1704(4) then calls for the court otherwise so deferring its original jurisdiction to "maintain jurisdiction for purposes of judicial review." These provisions call for administrative proceedings to arrive at a final decision first subject to appeal in the circuit court. Other authorities bearing on contested cases and appeals support our conclusion.

Appeals involve the parties in the original litigation, or subsets of them, and come about when initiated by one or more parties, with strangers to the case eligible to participate only as amici curiae constrained to addressing issues raised by the parties. See MCR 7.212(H). But Part 31 authorizes even strangers to the original permit proceedings to petition for a contested case. MCL 324.3113(3).

Further, the rules governing appellate practice establish that appeals in this Court "are heard on the original record," MCR 7.210(A), except that this Court, "in its discretion, and on the terms it deems just," may "permit amendments, corrections, or additions to the transcript or record," MCR 7.216(A)(4). In contrast, MCL 24.275 sets forth several general rules for admission of evidence in contested cases in the administrative setting, including incorporation by reference of "the rules of evidence as applied in a nonjury civil case in circuit court," and the statement that "an agency may admit and give probative effect to evidence of a type commonly relied upon by reasonably prudent men in the conduct of their affairs." This statute is inclusive in nature, much inviting of further evidentiary development. Likewise the administrative rules governing evidence as to the facts at issue," subrule (2) states that "parties shall present the evidence in an order determined by the administrative law judge," and subrule (4) authorizes parties to cross-examine witnesses. The conservative provisions for enlarging the record for purposes of appeals in this Court thus stand in stark contrast to the liberal provisions for presenting new evidence in administrative contested cases.

At oral argument, appellants attempted to draw support for their position from the administrative rules promulgated to implement Part 31. In particular, Mich Admin Code, R 323.2133, subrule (1) of which authorizes "the department" to issue a final decision on a permit application after review of pertinent determinations, recommendations, and comments, and subrule (2) of which states that "[a]n *appeal* to a final determination of the department made pursuant to subrule (1) ..., or to a condition of a permit issued, or the denial of a permit pursuant to part 31 of the act and the rules shall be in accordance with and subject to section 3113 of part 31 of the act." (Emphasis added.)

Appellants argue that use of the word "appeal" indicates the understanding that a contested case following an initial agency decision is in the nature of an appellate proceeding. We disagree. The word "appeal" appears in tandem with a reference to MCL 324.3113, and thus the latter's subsection (3) which, again, directs that a contested case proceed in accord with the Administrative Procedures Act. That incorporation by reference thus brings to bear MCL 24.275's generous provisions for submission of new evidence, which, as noted, are more consistent with original actions than appellate ones. Further, "It is fundamental administrative law that administrative agencies are the creatures of statute." *Castro v Goemaere*, 53 Mich App 78, 80; 218 NW2d 395 (1974). Accordingly, an agency cannot, by word choice or otherwise,

transform statutory provisions reserving appellate review to the judiciary into a scheme whereby the agency itself sits as its own first appellate tribunal.

Appellants rely on In re 1987-1988 Med Doctor Provider Class Plan, 203 Mich App 707; 514 NW2d 471 (1994), where this Court held that a contested case conducted in accord with the Administrative Procedures Act, which thus may involve introduction of new evidence, does not necessarily transform the contested case into "a 'square one' determination 'de novo' " of the issue at hand. Id. at 728. But, as the circuit court in this case noted, that case involved "an unusual appellate process." Id. at 724. At issue was a statutory scheme according to which a determination report of the Insurance Commissioner is subject to appellate review by an independent hearing officer. See *id.* at 710. This Court noted that, although the appeal was to take the form of a contested case under the Administrative Procedures Act, the pertinent provisions of the Nonprofit Health Care Corporation Reform Act, MCL 550.1101 et seq., consistently specified that the independent hearing officer's review was in the nature of an appeal. In re Med Doctor, 203 Mich App at 725-726. Accordingly, despite being directed to conduct a contested case pursuant to the Administrative Procedures Act, the independent hearing officer owed considerable deference to the Insurance Commissioner. Id. at 727-728. In re Med Doctor is distinguishable from the instant case in that Part 31 nowhere describes a contested case to decide whether to grant a groundwater discharge permit as an appeal.

Appellants also rely on *Sierra Club Mackinac Chapter v Dep't of Environmental Quality*, 277 Mich App 531; 747 NW2d 321 (2008), where this Court disapproved of the DEQ's practice of issuing general permits to allow concentrated animal feeding operations to develop their own comprehensive nutrient management plans that substantially bypassed the public participation required for the permitting process by the federal Clean Water Act.⁵ *Id.* at 554-555. *Sierra Club* is distinguishable from the instant case because the application process here at issue included extensive public notice and comment, of which appellants took full advantage.

Appellants complain that the additional evidence received through contested case proceedings was not subject to such public scrutiny, but cite no authority that stands for the proposition that, where the evidentiary record is supplemented for contested case proceedings in accord with MCL 324.3113(3), MCL 24.275, and Rule 324.64, any such new evidence must be limited to matters subjected to public notice and comment in accord with the initial review process. We do not deem the Legislature's apparent satisfaction that public notice and comment attend to only the initial permitting process as suggesting that the Legislature envisioned proceeding to a contested case as starting the appeal process instead of continuing the original decisional machinations.

For these reasons, the DEQ and the circuit court correctly recognized the contested case below as an extension of the initial application process for the purpose of arriving at a single final agency decision on the application for a groundwater discharge permit.

⁵ 33 USC 1251 *et seq.*

IV. SCOPE OF THE PART 31 PERMIT

Kennecott Eagle applied for a permit to discharge storm water coming into contact with potentially polluting materials at the surface of the mine site, drainage water collected from the development rock storage area, and water pumped out of the mine to enable mining operations. The DEQ granted a permit authorizing a maximum daily discharge originating from the aforementioned sources of 504,000 gallons per day, or 350 gallons per minute, through the treated water infiltration system. Appellants argue that the Part 31 permitting process should have also covered Kennecott's plans to recirculate utility water⁶ within the mine, to backfill the mine cavity in time by returning development rock to it, and to re-flood the mine upon the completion of operations. At issue is whether the circuit court erred in treating this issue as properly preserved, whether it correctly allocated the burden of proof, and whether it correctly identified the pertinent substantive requirements of Part 31.

A. ISSUE PRESERVATION

An issue is preserved for appellate review if it was raised before, and decided by, the trial court. See *Fast Air, Inc v Knight*, 235 Mich App 541, 549; 599 NW2d 489 (1999). In this case, there was considerable advocacy and decision-making concerning this issue in the proceedings below.

In answering appellants' exceptions to the proposal for decision, Kennecott Eagle argued that the instant proceeding was limited to a determination of the adequacy of the permits at hand, and that appellants' "claim that Kennecott needs additional permits to engage in mining activity is not a basis for overturning the Permits at issue in this proceeding." Kennecott appended to that brief a copy of its closing arguments and proposed findings of fact and conclusions of law, which included the assertions that the alleged discharges of which appellants make issue "do not involve 'discharges' at all within the meaning of the Part 22 groundwater permit rules, or they are the subject of specific exemptions from the permitting requirements of the Part 22 rules."

An employee of the DEQ's Water Bureau testified that the agency's position was that the discharges of which appellants make issue came under exemptions to permit requirements as specified in Mich Admin Code, R 323.2210(a) to (x), or, alternatively, that because the discharges in question all involved in-mine operations, they were subject to regulation under Part 632's provisions governing mining permits, not Part 31's provisions governing groundwater discharge permits.

For these reasons, the circuit court did not err in considering whether, to the extent that the discharges of which appellants made issue required permits, they did not necessarily have to come under the specific permit under review.

 $^{^{6}}$ One of appellants' witnesses described "utility water" as inflowing water that, "before it goes into the wastewater treatment plant . . . is peeled off . . . for different uses at the mine facility."

Appellants point out that Mich Admin Code, R 324.74(1) directs that review of a proposal for decision by a final decision-maker "shall be restricted to the record made at the hearing and the exceptions and arguments submitted by the parties," and suggests that subsequent review should be likewise so limited. We disagree. As discussed in Part III, *supra*, contested case proceedings of this sort are an extension of the original application proceedings, not appellate review of the initial decision on the application. Rule 324.74(1) thus sets forth limitations on the final decision-maker after a potentially lengthy and expansive decision-making process presided over by the administrative law judge. It does not admonish against exercise by an appellate court, including the circuit court when sitting in that capacity, of any of an appellate court's normal decision-making process.

B. BURDEN OF PROOF

The circuit court, citing *Brown v Beckwith Evans Co*, 192 Mich App 158, 168-169; 480 NW2d 311 (1991), recited the general rule according to which a party claiming the benefit of a statutory exception bears the burden of proving the applicability of that exception, and then concluded that the ALJ and final decision-maker below erred in putting the burden on appellants to prove that exemptions to permit requirements did not apply. We conclude that the circuit court was led slightly astray on this issue.

In discussing the Part 31 permit, the ALJ never suggested that Kennecott Eagle bore no responsibility for showing that exemptions applied while holding appellants responsible for proving that they did not. Appellants concede that the DEQ's final determination and order similarly does not state that appellants were obliged to prove that the exemptions did not apply, but note that the order does state in general terms that the petitioners in a contested case hearing bear the burden of proving the objections they raise.

As we discussed in the companion case,⁷ an applicant for a permit retains that status, and the attendant burden of proof, throughout the permitting process in connection with proving entitlement to the permit, but a petitioner in a contested case hearing normally bears the burden of proving that petitioner's objections. See Mich Admin Code, R 323.2206(1) ("It is the responsibility of the applicant to provide the information described in these rules as required or necessary for the department to make a decision."); Rule 324.64(1) (imposing on a party "filing an administrative complaint or petition for a contested case hearing . . . the burden of proof and of moving forward unless otherwise required by law.").

Accordingly, to the extent that Kennecott Eagle relied on exemptions to permit requirements, it bore the burden of proving that they applied, and to the extent appellants disagreed they bore the burden of proving otherwise. There was no error in allocations of burdens of proof in connection with this issue.

⁷ *Nat'l Wildlife Federation v Dep't of Environmental Quality*, ____ Mich App at ____ (Docket No. 307602, issued 2014), slip op pp _____.

Further, this issue concerns a question of law, not evaluation of evidence. Accordingly, as the circuit court held, any error in allocation of burdens of proof was harmless.

C. PART 31 PERMIT

Kennecott's application for a Part 31 permit covered discharges of storm water coming into contact with potentially polluting materials at the surface of the mine site, drainage water collected from the development rock⁸ storage area, and water pumped out of the mine to enable mining operations, and the resulting permit authorizes a maximum daily discharge originating from the aforementioned sources of 504,000 gallons per day, or 350 gallons per minute through the treated water infiltration system. Appellants insist that Kennecott's plans to recirculate utility water within the mine, to backfill excavated areas in time by returning development rock to the mine cavity, and to re-flood the mine upon the completion of operations likewise require a Part 31 permit.

The ALJ, in the proposal for decision, held that those activities "either do not involve 'discharges' within the meaning of the Part 22 administrative rules, or are subject to specific exemptions from the permitting requirements as set forth in those rules."

Concerning utility water, Mich Admin Code, R 323.2201(i) defines "discharge" as "any direct or indirect discharge . . . into the groundwater or on the ground" of waste, waste effluent, wastewater, pollutant, cooling water, or combination of those things. The ALJ noted this definition, and added that according to *Webster's Ninth New Collegiate Dictionary* (1983) "discharge" means " 'a flowing or issuing out.' " The ALJ reasoned that the "utility water is cycled through the mining operation in closed-loop fashion," and since "[t]here is no 'discharge' of utility water," there is no need for a discharge permit.

The ALJ continued that the process of "backfilling and rapidly reflooding the mine" came under the following three exemptions set forth in Rule 323.2210:

(w) A discharge that has been specifically authorized by the department under a permit if the permit was not issued under this part.

(x) A discharge that has been specifically authorized by the department under a permit if the permit was not issued under this part.

(y) A discharge that occurs as the result of placing waste materials on the ground in compliance with a designation of inertness issued under part 115 . . .

The ALJ elaborated as follows:

Because Kennecott's backfilling and reflooding operations: (1) are authorized under the Part 632 permit; (2) consist of backfill materials that

⁸ "Development rock" is the rock that must be excavated to provide access to the desired ores.

automatically qualify as "inert" under Part 115[⁹]; and (3) will occur in an unusuable aquifer, and because the Part 632 permit imposes requirements to protect the upper glacial aquifer to minimize the risks of any impacts from the backfill and reflooding, the DEQ implicitly concluded that the backfill and reflooding would not be "injurious," . . . they are exempt "discharges" under the Part 22 rules and, therefore, Kennecott is not required to obtain an additional Part 31 permit for those activities.

Appellants expressly eschew offering argument with the ALJ's reasoning, characterizing such advocacy as beyond the scope of this appeal.

The circuit court in turn held as follows:

[T]he permit being challenged here is a permit to discharge from the mine's wastewater treatment system. The necessity for Kennecott to seek additional Part 31 discharge permits for the other discharges, specifically for the discharge into the mine of utility water, backfill, and water to re-flood the mine, accordingly, is irrelevant....

... Petitioners assert that they are not arguing that additional Part 31 permits are required, but rather that the discharges into the mine of utility water, backfill, and water to re-flood the mine are required to be considered and included in the Part 31 permit at issue here. Clearly discharges into the mine, which never become discharges from the wastewater treatment system, are entirely different [from] discharges from the wastewater treatment system into the groundwater and, accordingly, to the extent that such discharges might require a Part 31 permit, that permit (or permits) would be separate from the Part 31 permit currently being challenged.

We think the ALJ's treatment of this issue more satisfactory than that of the circuit court. It is apparent that appellants' concern was that there was no Part 31 permit for utility water within the mine, or for backfilling and re-flooding, not necessarily that the permit under consideration did not happen to include those things. Because the objection was that those activities were subject to regulation through a Part 31 permit, but that none was requested, let alone issued, the circuit court was hasty in disposing of those objections simply on the grounds that additional Part 31 permitting might come about.

⁹ Part 115 of the Natural Resources and Environmental Protection Act comprises MCL 324.11501 to MCL 324.11550 and concerns solid waste management. Within those provisions, § 11504(2) defines "inert material" as "a substance that will not decompose, dissolve, or in any other way form a contaminated leachate upon contact with water, or other liquids determined by the department as likely to be found at the disposal area, percolating through the substance." Section 11507(3) in turn states, "The department may exempt from regulation under this part solid waste that is determined by the department to be inert material for uses and in a manner approved by the department."

The ALJ, however, ably identified bases for recognizing that Kennecott's plans for utility water within the mine do not involve any discharges for purposes of Part 31, along with exemptions to permit requirements applicable to the plans for backfilling and re-flooding, which harmonize nicely with appellees' position that activities within the mine came under the Part 632 permit and thus required no separate Part 31 permit.

For these reasons, we adopt the ALJ's reasoning as our own in affirming the circuit court's determination that the discharge permit at issue was not invalidated for failing to cover the additional activities of which appellants here make issue.

V. WASTEWATER TREATMENT SYSTEM

Appellants argue that the DEQ and circuit court erred in approving plans for the wastewater treatment system, on the grounds that the design was not yet complete, and that Kennecott Eagle did not satisfy the requirement to predict wastewater influent¹⁰ concentrations with some accuracy. The circuit court affirmed the DEQ's conclusions that the state of design of the wastewater treatment system was sufficiently advanced that the DEQ could evaluate it, that the estimates or assumptions used to predict the quality of influent and rate of water inflow well enough satisfied the requirements of the applicable administrative rules, and that Kennecott Eagle used the best available information or technology for those purposes. We agree with the circuit court.

Again, MCL 324.3106 states that "[t]he department. . . shall issue permits that will assure compliance with state standards to regulate municipal, industrial, and commercial discharges or storage of any substance that may affect the quality of the waters of the state," and MCL 324.3112(1) states that "[a] person shall not discharge any waste or waste effluent into the waters of this state unless the person is in possession of a valid permit from the department."

The applicable administrative rules require an applicant for a Part 31 discharge permit to show that the proposed wastewater treatment system has sufficient capacity to treat the anticipated influent, and to describe the anticipated influent, characterize the discharge using the best available information, and evaluate and implement the best technology in process and treatment that would eliminate or reduce the new or increased loading of certain listed substances. "It is the responsibility of the applicant to provide the information described in these rules as required or necessary for the department to make a decision." Mich Admin Code, R 323.2206(1).

A. DESIGN OF WASTEWATER TREATMENT SYSTEM

Mich Admin Code, R 323.2218(2) conditions discharge permits on showing that "the proposed system for treating the wastewater to be discharged shall have sufficient hydraulic capacity and detention time to adequately treat the anticipated organic and inorganic pollutant

¹⁰ "Influent" refers to the wastewater coming into the system for treatment, and "effluent" refers the treated water to be discharged into the environment.

loading," states that for this purpose "at the time of application a permit applicant shall submit a basis of design for the treatment system," and lists many factors to be covered. Subrule (c) calls for "[a] description of the existing or proposed treatment, or both," then sets forth many details that must be addressed.

Appellants do not assert that Kennecott Eagle's application failed to address any of these requirements, but argue instead that testimony concerning the possibility of design modification or other changes in operations as needs arise showed that there really was no complete plan in place for the DEQ to evaluate.

An environmental chemist described the proposed wastewater treatment system as "expensive," "complicated," and "unprecedented," and elaborated that "it would be highly unusual to have all these components put together and work the first time out." The expert continued, "I suspect that certainly before designing the system . . . there would need to be quite a bit more work before you can assume a system like this will work." The witness opined that the proposal was "not unreasonable," but nonetheless "may not work." The expert noted that alternative approaches were under consideration for a major aspect of the system's design, and expressed the concern that "certainly this water treatment system has not been tested, and they're not completely sure how they're going to configure it yet either." The witness added, "I would suggest that it needs certainly a much more extensive set of tests to determine in fact that these individual components could . . . come together to treat water quality that's both . . . predicted and then plus some uncertainty in that water quality."

The lead process engineer for the mining project, who served as its certifying engineer for the groundwater discharge application, similarly testified that Kennecott was evaluating some alternative approaches for some aspects of the wastewater treatment process, and that early in the review process it would be unusual to offer more detailed specifications for the system. This expert agreed that the particular combination of components envisioned for the instant system was a new one, but added that the individual components were mature and well tested. The process engineer continued that the system was conservatively designed such that it would be able to treat much higher concentrations of contaminants than predicted levels and still stay within the permitted discharge limits.

The official with the DEQ's Water Bureau who reviewed the basis for the design of the wastewater treatment system stated that the individual unit processes proposed or included in the basis of design for the system in question were demonstrated technologies used in other industrial settings, and opined that there was no reason to believe they would not work well for present purposes. This witness opined that Kennecott Eagle's application and supplemental information adequately described the basis for the proposed system and its expected performance. She additionally opined that Kennecott had shown that the proposed treatment system made use of the most advanced, adequately demonstrated, and reasonably available treatment techniques.

The circuit court noted that Rule 323.2218(2) does not require any set level of specificity in making the required showing, but instead requires a description of the existing or proposed treatment, along with, to the extent applicable, engineering plans depicting such things as a schematic flow diagram, information on unit processes, flow rates, and design hydraulic

capacity. The court further noted that the only requirement of finality with regard to the wastewater treatment system attended to the Part 632 mining permit, not the Part 31 discharge permit.

We agree that Rule 323.2218(2)'s call for submission of a "basis of design" is not a demand for an exhaustive plan complete in every detail. The rule thus reflects the understanding that undertakings of this sort remain projects in progress well into operations. That certain details of operation were not yet firmly in place, or that alternatives were under consideration for some aspects of design, underscore Kennecott's preparedness to address a broad range of potential realities as they come into play in order to operate within permit limits. Because there was substantial evidence that the design of the proposed wastewater treatment system, including where alternatives were yet in contemplation, was sufficiently complete and detailed to allow the DEQ to evaluate it for purposes of the Part 31 permit, the circuit court properly rejected appellants' argument to the contrary.

B. ANTICIPATED INFLUENT CONCENTRATIONS

Mich Admin Code, R 323.2218(2)(b) requires that a discharge permit applicant's description of the basis for design of the treatment system include "a description of the anticipated influent, including the substances to be treated . . . and the concentrations of the substances." Appellants argue that Kennecott Eagle failed to satisfy this requirement because its witnesses provided insufficiently precise or firm estimates in these regards.

Appellants make issue of the testimony of the geochemist whose company performed the geochemical testing in connection with the instant mining project. That witness testified that "there are sufficient sulfide minerals present in the development rock and the concentrations of trace metals are sufficiently high that active management of all rock units in the mine . . . will be required in order to have a modern environmental program for a mine." He explained that he did not endeavor to predict precisely the number of various constituents that would be in the water in the mine, or water collected from the development rock storage area, because he did not believe such predictions scientifically possible. The expert elaborated that he had engaged in "an exploratory type of modeling for the purposes of answering simple questions about the directions that materials are going to go in a system, not making firm predictions of specific details that would exist sometime in the future before we've ever gone underground."

The geochemist continued that his reporting relied on estimates of concentrations of pollutants that were generally lower than those of appellants' experts because "we had data only up to about week 50" and the others were using a "time period in here around 50 to 70 weeks," and added that "there are increasing concentrations in some but not all of the samples." But the witness stated that, even if crediting the higher figures, his conclusion remained that the situation called for active management of all rock types.

The geochemist additionally acknowledged that he used an estimate for the rate of groundwater inflow into the mine based on information from Kennecott's hydrogeologist, and that had he used the estimate suggested in a later report, the result would have been an increase in the calculated concentration by a factor of approximately 2.4. The witness characterized those figures as illustrating the uncertainty inherent in calculations of that sort, and reiterated that his

advice to Kennecott, using either estimate or calculation, would have been that the situation called for active management.

Appellants suggest that this expert chose his figures arbitrarily, making no effort to arrive at accurate conclusions, and thus that any reliance on his work fell short of satisfying Rule 323.2218(2)(b)'s demand for "a description of the anticipated influent, including the substances to be treated . . . and the concentrations of the substances." The circuit court rebuffed those contentions, crediting the recommendation for "active management" as well covering the possibility that the hazard for acid rock drainage would be greater than estimated, and similarly noting that the various estimates Kennecott's experts used in modeling the operations were conservatively chosen in order to steer operations toward a system that could process even the largest reasonably apprehended quantities of wastewater and pollutants. The court further noted that Rule 323.2218(2)(b) does not call for accurate predictions of precise concentrations of pollutants, but instead reflects the understanding that "where an operation has not yet been undertaken it is scientifically impossible to provide an exact or accurate accounting of the concentrations of the substances that will be found in the operation's influent wastewater."

The circuit court concluded that, for these reasons, "there is evidence that a reasoning mind would accept as sufficient to support the . . . finding that Kennecott's influent wastewater quality prediction met the requirements of Part 31 and the administrative rules promulgated to implement Part 31."

We conclude that the circuit court correctly reasoned that, despite appellants' characterizations, the geochemist at issue was as concerned about the accuracy, or not, of some of the figures he was working with as the situation demanded. The court recognized that what was important, in light of the regulatory purpose behind Rule 323.2218(2)(b), was that the expert advised active management, meaning close monitoring and quick adjustments, in connection with all rock types removed from the mine, and that there was substantial evidence that the wastewater treatment system had sufficient capacity to handle the whole range of concentrations of contaminants, and water flow rates, that the various witnesses put forward as reasonably likely to occur.

Appellants further assert that the geochemist's prediction of mine drainage quality omitted the presence of backfill, where the backfilling actually planned would cause additional leaching and thus higher concentrations of pollutants, and that this expert admitted that the prediction was not accurate and not intended to be. However, this characterization does not accurately reflect the record. In fact, the geochemist explained that he eschewed taking backfill into account for that particular calculation because he "was looking at what the impacts of the mine walls would be on water quality," and was thus "simplifying the system for the purposes of understanding a partial behavior and providing information that would be useful to my client." The expert then continued that in forecasting a final scenario for the water quality in the mine after the completion of operations, he had "assumed 379,000 tons of backfill without limestone amendment."¹¹

C. CHARACTERIZATION OF DISCHARGE, PREDICTED EFFLUENT, BEST TECHNOLOGY AVAILABLE

Rule 323.2220(1) obligates an applicant for a discharge permit to "properly characterize the waste or wastewater to be discharged" by determining "the pollutants that may be present in the waste or wastewater in light of the process by which it is generated." Subrule (6) states that, "[f]or a facility not yet operating, the discharger shall characterize the anticipated discharge using the best available information" and "identify the source of the information in the application." Similarly, Rule 323.1098(4)(b)(iii) requires a "discharger" in certain situations, including this one,¹² to "evaluate and implement the best technology in process and treatment that would eliminate or reduce the new or increased loading of the LSB-BSIC,"¹³ and defines "best technology in process and treatment" as "the most advanced treatment techniques which have been adequately demonstrated and which are reasonably available to the discharger."

Appellants argue that their objections concerning the state of design completion, and the accuracy of various predictions and estimates, apply in connection with the rules governing discharges also, on the ground that, before deciding to issue a permit on the basis of an applicant's predictions of the concentrations of contaminants that will be in its discharge, the DEQ must confirm that the applicant's predictions are correct, and that the proposed treatment system is in fact capable of meeting those predictions. For the same reasons that we concluded that the circuit court correctly rejected those objections in connection with Rule 323.2218(2)(b) (anticipating influent quality) and (c) (system design), we conclude that the circuit court correctly rejected them in connection with the rule governing effluent.¹⁴ Further, the circuit court specifically cited expert testimony that the proposed treatment system made use of the most advanced, adequately demonstrated, and reasonably available treatment techniques as substantial evidence that that requirement of Rule 323.1089(4)(b)(iii) had been met.

¹¹ The witness here referred to Kennecott's plan to neutralize stored development rock with limestone to reduce its potential to leak sulfuric acid.

¹² The DEQ determined that this "antidegradation" rule would apply to the discharges here at issue, and Kennecott Eagle has not argued otherwise.

 $^{^{13}}$ This initialism stands for "Lake Superior basin-bioaccumulative substances of immediate concern," which are "substances identified in the September 1991 binational program to restore and protect the Lake Superior basin" Mich Admin Code, R 323.1043(qq).

¹⁴ The circuit court held that because Rule 323.2220(1) and (6) concerned discharges, there was no need to consider those subrules while deciding whether Rule 323.2218(2)(b)'s requirements regarding anticipated influent were satisfied. Appellants characterize this holding as a declaration that "inaccurate prediction of wastewater influent concentrations is not relevant to these rules." In fact, the circuit court simply considered those objections under a different rubric.

For these reasons, we reject appellant's claims of error concerning system design, estimates or assumptions concerning concentrations of contaminants, or use of the best available information or technology.

VI. CONCLUSION

For the reasons stated, we affirm the decision of the circuit court affirming the DEQ's decision to grant Kennecott Eagle a Part 31 groundwater discharge permit.

Affirmed. No taxable costs under MCR 7.219, a question of public policy involved.

/s/ Mark J. Cavanagh /s/ Donald S. Owens /s/ Cynthia Diane Stephens