Rural Valuation Topic #RVT 22: Mineral Rights

"Most of the mineral rights in the western U. S. have been partially or entirely severed. Those areas where 100% of the mineral rights remain are generally located in areas considered geologically inert. Mineral rights can be owned by different entities where the rights are reserved There are numerous combinations of reservations and configurations vertical and horizontal"[1].

Understanding mineral rights and their valuation, whether producing or non-producing, could easily be a separate textbook. The valuation of minerals and/or mineral rights follows the same procedures as surface rights. However, familiarity with a few basic terms from traditional valuation sources is necessary to begin identifying what "mineral rights" actually mean. <u>*(ASFMRA emphasis added via italics and underlining as shown below)*</u>

a. **Real Estate** is defined as, "2.) land and <u>*all things that are natural part of the land*</u> (e.g., trees, minerals) and things that have been attached to the land (e.g., buildings and site improvements) and all permanent building attachments (e.g., mechanical and electrical plant providing services to a building) that are <u>*both below and above ground*</u>"[2].

b. **Mineral Rights** are not described per se, and references **Subsurface Rights** which are defined as, "1.) <u>*the rights to the use of the underground portion of a designated property; usually refers to the right to extract coal, minerals, oils, gas, or other hydrocarbon substances as designated in the grant*</u>, 2.) the right to construct and maintain tunnels, subways, pipelines, sewers, etc."[3].

c. **Severed Mineral Rights** is defined as, "<u>*ownership of subsurface minerals separates from ownership of the remainder of the real estate property*</u>. Severance can occur by mineral deed or by mineral reservation"[4].

d. **Quarry** is defined as, "a <u>*type of open-pit mine from which rock or minerals*</u> (e.g., marble, granite, limestone, gravel) are extracted, generally for use as building materials"[5].

e. **Royalty** is defined as, "money paid to an owner of real estate or the owner of the mineral rights, if different than the owner of the real estate, for the right to deplete a natural resource (e.g., oil, gas, minerals, stone, builders' sand and gravel, timber); usually <u>*expressed as a portion of revenue received for, or price per unit of, the resource extracted*</u>"[6].

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[1] American Society of Farm Managers and Rural Appraisers: *Valuing Rural America*, 2019 Edition, (Denver, ASFMRA, p. 512).

[2] Appraisal Institute, *The Dictionary of Real Estate Appraisal*, 6th Ed., (Chicago: AI 2015, p.186)

[3] Ibid, p. 228

[4] Ibid, p. 213

[5] Ibid, p. 183

[6] Ibid, p. 205

f. **Locatable Minerals**: The Mining Law of 1872 (as amended) is the first major law governing "locatable minerals" *__under federal lands__*.

- What are "locatable minerals"?
  - They are metals, nonmetallic industrial minerals, and uncommon varieties of salable minerals. Uncommon varieties can include deposits with properties that give it a distinct and special value (30 USC 611).
- What are salable minerals?
  - They are common variety minerals that are generally used for building, construction, and other bulk applications.
- What are leasable minerals?
  - They are generally minerals that are used for fuel, energy, and other chemical applications.

g. **Non-Locatable Minerals** *__(under federal lands)__***:** Common varieties of minerals. These are typically sand, stone, gravel, pumice, pumicite, clay, fill-dirt, rip-rap, cinders (shale), flagstone, quartz, moss rock, and peat.

For rural valuers, the basic questions begin with the distinction between "minerals" versus "rocks" and involve differences between "what they are" and "where are they found". Geologists simply say, if something is formally defined as a mineral --- it is a mineral. In contrast, rocks are mineral aggregates of more than one mineral and/or other compounds.

Minerals are generally part of the *__mineral estate__*. Most rocks are mineral aggregates and/or compounds and are generally part of the *__surface estate__* in most states. **The rural valuer must gain an understanding of how the state within which the property is located defines the mineral estate vs. the surface estate.**

Hypothetical Mineral Ownership Example: Smith owns the surface and 100% of the minerals in Property #11. Smith conveys Property #11 to Jones by Warranty Deed and reserves all oil, gas and other minerals. Who can mine the gravel on Property #11? Answer: ***it depends on the Congressional Act*** *(or State law)* ***under which the land was patented***:

- Federal mineral reservations in patents issued under the Stock-Raising Homestead Act of 1916, include gravel (43 U.S.C. Section 291-301, repealed by Act, October 21, 1976, P.L. 94-579). Other Acts are different; seek legal advice when unknown.
- Mineral Reservations by some states do NOT include gravel; therefore, they must be specifically stated in any legal conveyance.

General Statements Involving the Mineral Estate

- Severance of the minerals from the surface estate commonly occurs by a deed reservation.

    - A mineral estate owner can convey all or part of the mineral rights owned even in the smallest percentages. The smallest mineral right owner has the right to develop the entire mineral estate as long as the remaining mineral interests are compensated proportionately.
    - There is a difference between a "grant" and "reservation" --- seek legal advice.
- The mineral estate is ***dominant*** over the surface estate, i.e., the surface is subservient.

Many states require the mineral owner to:

- Provide notice to the surface owner of any proposed surface operations
- Pay the surface owner for damages to the property affected by mineral development. Damages include lost production and damage to any improvements.

Mineral Estate Reservations Under Federal Lands

It is noted, there are over 57 million federal mineral acres in the U.S. that are overlaid by private surface ownership. Simply owning the surface may not entitle that owner to the minerals because of a prior U.S. Government reservation. If the minerals were NOT reserved by the U.S. Government, the mineral estate is part of the surface ownership and vested with whomever the patent was issued and is available for separate conveyance to entities other than the surface owner.

Mineral Rights Ownership & Partial Interests

In the private sector, the "divided or undivided rights in real estate" phrase is clear; however, real estate or property can be held by corporations or partnerships which is legally defined as "co-ownership".

Partial interests, say a 25% ownership of the mineral estate (which can be described independently as a separate estate), create "leased fee" and "leasehold" positions at a minimum, if the minerals are leased.

Rural valuers typically are challenged with

- royalties if the minerals are producing, or the
- leased fee portion for any leased non-producing mineral interests.

Producing minerals rarely sell with the surface. When production is sold, the sale price and transfer is typically based on the "net mineral acres" or NMA's. The reason is the income or potential income is split proportionally according to the percentage owned (there is no discount for fractional interests). Therefore, a 1% mineral estate owner always:

- has the right to develop the mineral estate; even in the most minute percentages, and
- receives the same percentage of all bonuses, royalties, or leasing income--- no matter what the surface percentage owned, or the remainder mineral interests held by others.

Most buyers prefer to have "some" mineral ownership with the surface rights. This "dual" estate ownership places the surface owner in control over negotiating surface damages. In states with production and active mineral leasing, properties listed for sale without any minerals routinely take longer to sell than properties with that small percentage mineral ownership or no minerals (surface only).

“Dominance” Associated with Mixed Mineral Estates <u>on/under Federal Lands</u>:

“Common material” or “salable deposits” are defined as “**common variety minerals**” (Item “g.” on the first page of this section). For valuation, non-locatable common variety minerals are partial interests to the fee simple estate. In some states, aggregates are also considered to be a part of the surface estate. Split estates can occur, e.g., area sales show combinations of gravel (aggregate), oil and gas, and coal; and, three (3) different people can own these different mineral interests --- each with a right to use the surface owner’s land for extraction. As stated earlier, the surface owner is entitled to annual payments for access, loss in use (e.g., grazing, crops, etc.), and damages for locatable minerals they do not own. Frequently, one entity can own the surface, and another own only the sand/gravel interest, even though both are legally considered to be part of the surface estate in State XX. In these cases, certain states require the surface owner to be compensated for any use of the surface including damages.

In adjoining State YY, the term “minerals” includes oil, gas, coal, clay, gravel, uranium, and all other minerals of any kind and nature. The law (State YY’s Mineral Rights Act) treats each mineral “as **separate property from the land or surface**” under which they exist. That law enables others in State YY, and the owners of the different mineral rights to use the surface owner’s land for extraction. The right to own and develop a claim can be negated if the mineral claimant does NOT:

- take defined **actions** (a/k/a “prove up”) toward “mineral claim development” or
- file a “statement of claim” within ten (10) years in most states up to 23-years (State ZZ).

Inactivity means the mineral rights become dormant, abandoned, or “orphaned”; and, the rights to access, remove and develop the minerals are lost.

When the minerals (on or below the surface) are owned by the United States, federal laws are sovereign which “exempts” the minerals for the associated state laws --- an important consideration.

Non-locatable minerals can be classified by a qualified mineral examiner to have significant value and become an uncommon variety. For instance, a feldspar deposit with potassium carbonate and other concentrations greater than 10%, are considered to be a locatable material. That product is sought nationwide by potters, artists, and ceramics manufacturers. A companion product in some feldspar mines is Mica. Mica, like feldspar, can be considered locatable if it contains the right properties to be used in abrasives, ceramics, glazes, grinding wheels, insulators, porcelain, pottery, sanitary wares, UV and rebar coatings. Coatings that utilize these minerals include pipelines, floor sealants, wood stains, chemically resistant and anti-slip epoxy(s).

- Locatable minerals trigger a federal fee under the US Mining Laws Act of May 10, 1872 (17 Stat. 91), as amended.

- Non-locatable materials can sometimes emerge from the same pits as the "locatable classified" material.
    - Waste rock (often called dumps) as rubble or cobble is NOT typically categorized as "locatable" and is usually pushed aside by the operator. However, these materials may have value if there is a market (demand) for them as a decorative stone, landscaping material or for non-structural construction materials such as an aggregate used on driveways, and if under Federal ownership falls under the Mineral Material Act of 1947.

> *NOTE: The Mineral Materials Act provided a legal way for BLM and other agencies to allow counties, local government, quasi-govt. agencies, and even states to utilize aggregates and other materials as "free use." And, it does not require the materials be appraised, i.e., only requires "adequate compensation". As a result, The Departments of Interior (DOI) and Agriculture (USDA) developed manuals and handbooks with direction stating, if sold to the private market and not competitively bid to the highest bidder that they be appraised at "fair market value" [now "Market*

When faced with property valuations involving minerals, seek legal counsel to provide clarity for the estate valued no matter who owns them. Ultimately, it is the *valuer's responsibility* to know the exact mineral ownership or specific rights appraised. In some instances, the surface may require one appraisal and the minerals a separate valuation. An appraiser may have to call for a title and/or legal opinion because of "mixed" state and federal laws covering things like sand, gravel, etc., existing production, "pooling", "production units", etc.

ASFMRA Summary & Recommendations: The mere existence or absence of minerals or mineral rights in any percentage does not automatically mean either of these conditions create a positive, negative, or neutral position. Whenever mineral rights are held, the question becomes, what do they contribute either standing alone or as part of the surface estate in a particular market area? There are several elements to consider for producing or non-producing rights, most of which may require consultants and extended comments within the report:

- physical and geological characteristics
- resource quantity and quality
- supply and demand and/or proximity to processing facilities, pipelines, storage, etc.
- proximity to leasing activity
- proximity to producing reserves
- marketability considering the physical location, etc.

"Because the mineral estate is severable and has dominance, it is one of the bundle of rights that does not typically experience a discount for partial or fractional ownership positions.

If the appraiser is valuing "prospects", they should engage a consulting geologist and possibly others to evaluate the potential of generating positive income from the resource --- as part of their fee or valuation project cost. The same geologist may have to approximate the volume and quantity of the same resource on the sales as well. Some of the key issues in evaluating a *"prospect" centers on permits and water. Both are typically needed as part of the mining or development plan and are commonly over-looked. In arid states, obtaining that water right may be costly and time consuming.*

As a final note, one may be asked to value all or portions of subsurface estate. If you are valuing the royalties from oil, gas, or industrial minerals for example, do not overlook the other rights which are not producing, i.e., both should be considered [as part of the whole estate] and addressed in the valuation. If you are appraising a gas royalty (production exists), and there are no other mineral producing minerals beyond gas in the area, the appraiser should make an affirmative statement that the remaining non-producing mineral estate has nominal, if any value. The point is when you value a 5% interest in a mineral estate and it has producing gas, that royalty is the major component of value; however, if someone else developed a uranium mine on the same property that owner would [also] be entitled to 5% of that as well"[7].

[7] American Society of Farm Managers and Rural Appraisers: *Valuing Rural America*, 2019 Edition, (Denver, ASFMRA, p. 513-4).