Renewable Power Facilities: Placed-in-Service Issues

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Power and Taxes is a quarterly column that focuses on various tax and commercial issues arising in the booming renewable energy industry.

In this article, the authors address the complex issue of determining when a renewable energy asset is placed in service for federal income tax purposes. They focus on wind and solar assets, but other assets face similar questions.

At the end of 2015, Congress passed legislation that significantly benefited the renewable energy industry by extending the investment tax credit available under section 48 and the production tax credit (PTC) available under section 45.[1] The ITC and PTC have been vital to the growth of energy generated from renewable sources such as wind, solar, geothermal, biomass, and hydropower. Unlike prior legislation that provided a short-term fix,[2] the new legislation provides renewable energy developers and investors with a long runway to plan, staff, develop, build, invest in, and lend to a broad range of new facilities in the solar space, including utility scale, commercial and industrial, and residential projects. With this exciting development, it is an opportune time to consider recurring issues in many renewable energy transactions. Those issues often lead to problematic commercial issues, resolved with unnatural or illogical solutions that turn on decades-old legal precedent. Until Congress or the IRS provides guidance, these issues should be carefully considered, analyzed, and structurally incorporated into the multitude of renewable energy transactions that are sure to come.

Placed-in-Service Issues

A basic tenet of the tax law is that tax benefits such as the ITC, PTCs, and depreciation are available only if the property giving rise to the tax benefit has been placed in service for U.S. federal income tax purposes. To encourage renewable energy asset development and investment, Congress provided a tax credit — a powerful subsidy that reduces tax liabilities dollar for dollar to the extent of the credit. To stay true to that intent (and perhaps control the fiscal cost), the ITC accrues and PTCs start being generated when the qualifying property is first placed in service.[3] While this requirement seems relatively straightforward, the placed-in-service event when one is dealing with power-generating assets is far from clear. Power-generating assets take time to construct and are often built in multiple integrated parts by third parties; undergo in-depth preliminary and final testing; require various licenses and permits at various stages of development; can be operated on a provisional or test basis; require interconnection with a transmission line; must have their power converted from direct current to alternating current; and must be tied into and synchronized with the local power system.

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[1]The Consolidated Appropriations Act of 2016, H.R. 2029, P.L. 114-113.

[2]*See, e.g.*, Tax Increase Prevention Act of 2014 (H.R. 5771) (one-year extension); American Taxpayer Relief Act of 2012 (H.R. 8) (one-year extension; addition of "begun construction" standard); and Tax Relief, Unemployment Insurance Reauthorization, and Job Creation Act of 2010 (H.R. 4853) (one-year extension of section 1603 program).

(Footnote continued in next column.)

[3]Also, solar property claiming the ITC must be new, subject to depreciation, and first used by the taxpayer in order to be qualified property. Wind property claiming the PTC must produce and sell electricity to non-related persons within the United States, the construction of which begins before January 1, 2020.

The Law

For energy property placed in service during the tax year, the ITC is available and the PTC is first generated only when qualifying energy property is originally placed in service.[4] Neither section 48 nor section 45 defines "placed in service."

However, regulations governing when a taxpayer may claim depreciation deductions and the ITC provide that property is placed in service when it is first "placed in a condition or state of readiness and availability for a specifically assigned function."[5] To determine whether an electric power plant has been placed in service, courts[6] and the IRS[7] generally consider five factors: (1) whether the taxpayer has received all of the licenses and permits required for operation of the property;[8] (2) whether critical preoperational testing has been completed;[9] (3) whether there has been synchronization into a power grid for generating electric energy for the production of income;[10] (4) whether daily or regular operations have commenced;[11] and (5) whether the taxpayer controls the property.[12]

No single factor is dispositive of the placed-in-service determination.[13] In Rev. Rul. 84-85,[14] for example, the IRS considered whether a solid waste facility was placed in service within the meaning of reg. section 1.46-3(d) and ultimately ruled that although the facility was experiencing problems and was not able to operate at its rated capacity, it was being operated on a regular basis and salable steam was being produced.[15] Thus, the facility was treated as placed in service for purposes of claiming the ITC.

Similarly, in *Sealy Power*,[16] the court held that a solid waste power-generating facility was placed in service in the year at issue even though it failed to achieve anticipated electricity output levels. The court found that (1) the facility was exempt from any permitting and licensing requirements, (2) the facility did not have to perform any critical preoperational testing, (3) the taxpayer had title and legal control, (4) there were no facts to support whether the facility had been synchronized into the grid, and (5) the facility was operated on a regular basis. Although the court was not able to establish the presence of all factors (and some were inapplicable), no single factor was dispositive of the placed-in-service determination when the facility was capable of operation.

However, energy property will not be treated as placed in service if there are material impediments to achieving one of the placed-in-service factors, even if other factors have been satisfied. For example, in *Oglethorpe Power*,[17] the Tax Court held that a plant was not placed in service until it was placed in commercial operation, and not when it was first synchronized. According to the Tax Court, "initial synchronization alone is not determinative of the 'placed in service' date," and without the ability to operate on a daily basis, the property could not be treated as placed in service.[18] In that case, major

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[4]Section 48(a); section 45(a)(2).

[5]Reg. section 1.46-3(d)(ii); reg. section 1.167(a)-11(e)(1)(i).

[6]*See, e.g., N. States Power Co. v. United States*, 151 F.2d 876, 880 (8th Cir. 1998); and *Connecticut Yankee Atomic Power Co. v. United States*, 38 Fed. Cl. 721, 729 (1997).

[7]Rev. Rul. 84-85, 1984-1 C.B. 10; LTR 201205005; and LTR 9211009.

[8]*Tennessee Natural Gas Lines v. Commissioner*, 71 T.C. 74 (1978).

[9]*See, e.g., Sealy Power Ltd. v. Commissioner*, 46 Fed. Cl. 382, 395 (5th Cir. 1995), *nonacq.*, 1996-1 IRB 6; and LTR 9211009 (facility not placed in service until critical testing complete).

[10]Synchronization of an electric generating facility refers to the "state where alternating current systems, generating units, or a combination are connected and operated in parallel at the same frequency where the phase angle displacements between voltages in them are essentially constant." *Oglethorpe Power Corp. v. Commissioner*, T.C. Memo. 1990-505.

[11]This is equivalent to an energy asset being "placed in a condition or state of readiness and availability for a specifically assigned function." *N. States Power Co.*, 151 F.2d at 880. *See also Giles v. Commissioner*, 50 T.C.M. (CCH) 1342 (holding that a car was placed in service in 1979 even though it was not first used by the taxpayer until 1980, because it was operational); *SMC Corp. v. United States*, 675 F.2d 113, 114 (6th Cir. 1982), *aff'g* 46 A.F.T.R.2d (RIA) 5827 (1980) (affirming Tax Court's holding that equipment was placed in service even though it was not in use, because it was operational); *Sears Oil Co. Inc. v. Commissioner*, 359 F.2d 191, 198 (2d Cir. 1966) (holding that a barge was placed in service in 1957 even though not actually in use until 1958, because it was available for use "should the occasion arise"); and LTR 201205005 (wind-powered generation facility placed in service even though it had temporarily limited capacity).

[12]The IRS has ruled that, for purposes of determining whether property has been placed in service, a taxpayer had "control" of the property when the property was in the physical control of the taxpayer "with all the legal attributes of ownership such as title, risk of loss, and liability." Rev. Rul. 76-428, 1976-2 C.B. 47.

[13]*See, e.g., Sealy Power Ltd.*, 46 Fed. Cl. 382 (looking to Rev. Rul. 84-85 for applicable factors); and LTR 201326008 (applying the five factors to determine when a solar power generation facility was placed in service for purposes of claiming depreciation deductions and the energy credit).

[14]1984-1 C.B. 10.

[15]Rev. Rul. 84-85.

[16]*Sealy Power*, 46 Fed. Cl. 382. *But see* AOD 1995-010 (the IRS did not acquiesce to *Sealy Power* holding that electrical generating facility that produced only de minimis amounts of electricity sporadically in 1984, because of functional deficiencies in its equipment, was "placed in service." The IRS maintained that a facility must be ready to produce commercial quantities of electricity on a sustained basis before it may be treated as placed in service and that it would continue to argue that a facility unable to produce the product for which it was designed does not satisfy the daily operations test even if the inability arose from defects in design, faulty equipment, or similar problems.).

[17]*Oglethorpe Power Corp.*, T.C. Memo. 1990-505.

[18]*Id.* at 42.

defects in the facility existed after synchronization, which prevented continuous, daily operation.[19]

That said, when the commercial operational level has been limited because of issues outside the control of the facility and its operator, the IRS has ruled that a facility is placed in service. For example, in LTR 201205005, the IRS ruled that a wind-powered generation facility was placed in service even though its capacity was temporarily limited because of transmission congestion. According to the IRS, as long as the wind turbines "are ready and available for use and producing commercial output on a regular basis, operating at full rated capacity is not necessary to establish that the [wind turbines] are placed in service." In addition, in LTR 201326008, the IRS ruled that a solar photovoltaic power generation facility was placed in service even though the power produced was curtailed while the facility was being upgraded (but it was otherwise established that the project could produce and sell more than a de minimis amount of electricity).[20]

In general, when a condition is highly likely to occur and not contingent, it may be treated as satisfied. Thus, when a condition to being placed in service is guaranteed to occur, the facility may be treated as placed in service even if that condition has not yet been satisfied. For example, in *Tennessee Natural Gas Lines*,[21] the Tax Court held that a requirement for regulatory approval before sale of a liquefied natural gas facility was properly treated as a condition subsequent by the parties given that it was highly likely to occur and, therefore, was not an impediment to finality of the transaction. Similarly, if there is a high likelihood that permits and licenses will be coming or the achievement of full commercial operation is guaranteed to occur in the near future, the failure to receive such licenses and permits or full capacity commercial operation may be treated as a real, but highly unlikely, condition subsequent. Therefore, an asset may be considered to be placed in service even before one of the placed-in-service factors has occurred if the balance of the remaining factors weigh in favor of such a finding.[22]

As evidenced by the foregoing authorities, the determination of whether energy property has been placed in service depends heavily on the individual facts of a situation.

The Issue

In developing a renewable energy project, a developer-sponsor (or its predecessor) will locate suitable property and obtain necessary rights; negotiate and execute a power purchase agreement (PPA) (with a creditworthy offtaker, one hopes); obtain necessary licenses and permits; contract to acquire critical equipment (for example, panels, inverters, and turbines); enter into an engineering, procurement, and construction contract (EPC) or a balance of plant contract (BOP); possibly obtain a construction loan; and perform other activities necessary for project design, construction, and financing.

The developer-sponsor will also likely locate an equity investor that will provide long-term (takeout) financing. The investor will be an efficient user of the tax benefits generated by the project in that it can currently use tax deductions and credits to shelter its other taxable income, and the transaction will be structured in a manner that maximizes the tax savings allocated to the investor. This investor often has no interest in bearing construction risks, and often its internal mandate is that it must take all steps possible to mitigate risk. Therefore, the investor will require that it invest as late as possible relative to the development of the project — ideally, on the placed-in-service date. Thus, the question arises whether the investor is the first user of the property or if, by investing at a late stage in the construction process, the project was first placed in service before the closing of the investment. In the latter case, the investor loses the ability to claim the ITC in its entirety as well as any incremental tax benefits that accrued before its investment (depreciation) and, in a PTC deal, the PTCs that were generated between the deemed placed-in-service date and the investment date. Thus, the stakes are high.

The Analysis

Given the dramatic consequences and the tension with investors most often not willing to bear construction risk, there is intense focus on the construction and development process and when it is appropriate for an investor to invest in order to ensure it will be entitled to the expected tax benefits.

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[19]*Id.* at 36-37. *See also Consumers Power Co. v. Commissioner*, 89 T.C. 710 (1987) (holding that a pumped storage facility was not placed in service despite the fact that it generated electrical power and pumped water because those activities were necessary parts of preoperational testing and did not demonstrate that the facility was available for service on a regular basis); AOD 1995-010 *supra* note 16.

[20]*See also* LTR 201311003 ("as long as the [wind turbines] are ready and available for use and producing commercial output on a regular basis, operating at full rated capacity is not necessary to establish that the [wind turbines] are placed in service"); LTR 201302007 (wind facility was deemed to be placed in service for depreciation purposes despite the fact that it was operating below full rated capacity); and LTR 200334031 (wind facility was deemed to be placed in service for depreciation purposes despite the fact that it was operating below full rated capacity as long as the wind turbines are ready and available for use and regularly producing commercial output).

[21]71 T.C. 74.

[22]*See supra* sources cited at notes 17, 20.

As discussed earlier, for a power facility to be placed in service it is fair to say that the arguably dated five-factor test applies (with the noted exceptions and caveats).[23] In this context, the question is whether a facility will be treated as placed in service if some, but not all, of the placed-in-service factors have been satisfied.[24] Obviously, this approach requires gathering accurate, timely facts and a large degree of judgment.

For example, an investor or sponsor may suggest that if a facility is not synchronized, it cannot deliver power to the grid and, therefore, has not been placed in service. The IRS may take a contrary position and argue that the facility is in fact placed in service because the facility (1) is fully constructed, (2) has undergone all testing such that expectations are high that the facility will operate properly on an uninterrupted basis, (3) has obtained all necessary permits, (4) has been interconnected to the transmission line or grid, and (5) is controlled and operated by the sponsor. The issue is further complicated if the sponsor merely needs to ''flip a switch'' to synchronize the facility.[25]

As described above, when a condition is highly likely to occur and not contingent, it may be treated as satisfied. Accordingly, on these facts, the IRS may contend (and perhaps rightly so) that the facility has already been placed in service when synchronization is a mere formality within the control of the sponsor. Also, as in LTR 201205005 and LTR 201326008, it may be immaterial whether the facility can operate at full capacity as a result of third-party constraints (for example, because of the need to install incremental upgrades or as a result of curtailment). As such, the mere ability to operate once the sponsor ''flips the switch'' may be enough to establish that the facility has been placed in service.

In light of this potential attack and the stakes involved, investors should proceed with caution and strongly consider investing as early in the construction process as possible — perhaps before mechanical completion of the facility has occurred.[26] To address internal pressures to reduce risk, investors should be aware of the hazards of not making their investments at an early stage and, instead, seek contractual protections (for example, construction completion guarantees) to limit any potential construction risk.[27] We consider this tension further in our next column.

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[23]Other than the few private letter rulings cited in this article, no regulations, precedential rulings, or case law have been issued or decided on with respect to a modern renewable power facility.

[24]Almost all the authorities discussed above involve a taxpayer asserting that its property had been placed in service and the IRS taking a contrary position. In this situation, the parties reverse sides: The taxpayer hopes to use available guidance in its favor (to establish that the facility has not yet been placed in service). The burning question is whether the IRS will act consistently.

[25]With utility scale photovoltaic solar, the facts may create further tension in that construction of the facility often occurs in ''blocks.'' So, for a 100 megawatt facility, there may be five blocks of 20 megawatts each. Each block can be constructed, tested, interconnected, synchronized, and permitted to deliver power to the grid as ''test power'' under the PPA or on a ''merchant'' basis under the applicable ''ISO'' system. As is likely obvious, whether each block is separately placed in service is a tricky issue.

[26]Mechanical completion is generally defined in an EPC or BOP contract as the point when a facility (i) has been completely installed in accordance with the contract documents, is mechanically and electrically sound, and is ready for initial start-up, adjustment, testing, and commissioning; and (ii) is ready to be started up and thereafter continuously operated without damage to the facility or any other property, without injury to any person, and without voiding any third-party warranties.

[27]Of course, even if an investor makes an investment at an early stage (for example, before the EPC contractor declares mechanical completion), without clear guidance from the IRS, the ability to claim tax benefits is subject to uncertainty. To increase investor confidence and follow the stated policy objective of encouraging renewable energy investment, the IRS should issue guidance in the form of regulations regarding the precise factors that cause a renewable energy facility to be (or not to be) placed in service — for example, this guidance may provide that a facility is not placed into service if (notwithstanding other factors) it has not been synchronized or, better yet, if permission to operate has not been declared by the local utility. Consistent with precedent, until synchronization or permission to operate is declared, a facility cannot legally and technically perform its intended function (produce renewable energy for consumption by an offtaker) on a regular and continuous basis. Issuing guidance with this degree of specificity will resolve much of the ambiguity regarding the timing of tax equity investment and thus encourage further investment, reduce potential for controversy, and decrease unnecessary expenses of avoiding controversies. This form of guidance would not result in abusive transactions. An investor that commits his money before or concurrently with synchronization or permission to operate has still provided a portion (often a very large portion) of costs needed to develop a renewable energy asset and, for the ITC, will continue to invest in such asset for at least five years. Assuming the investor is otherwise a good ''tax owner'' of the asset, nothing from a policy perspective compels the investor to bear construction risk — instead, the investor and developer-sponsor should be free to structure and price the transaction so that construction risk is borne primarily by the party best positioned to mitigate the risk (the developer-sponsor). Lastly, there is nothing inherent in renewable energy assets that requires them to be treated any differently from most assets that taxpayers are entitled to buy new and commence using without affecting the ability to claim tax benefits.