General Facts for Both Sides

The CEO of Meridian Investments was wandering through the different exhibits at the annual National Association of Petroleum Engineers (“NAPE”) Expo in Houston in February 2016 when he came across DrillCorp’s booth. DrillCorp, a mid-major domestic oil and gas exploration and production company, was at the NAPE Expo soliciting an investment for its new Jefferson County Mantle prospect and locked Meridian into a conversation. Meridian viewed DrillCorp’s data and DrillCorp shared its interpretations of the data and the potential for success in the area. Meridian found DrillCorp’s presentation persuasive and over the next month, DrillCorp and Meridian executed a Joint Operating Agreement1 (“JOA”) whereby Meridian would pay DrillCorp $25,000,000 and evenly share all drilling, development, and production costs for all wells drilled in the Contract Area2 with DrillCorp in exchange for half of all production from such wells. DrillCorp would act as operator of the Mantle prospect for the benefit of themselves and Meridian as the non-operator.

DrillCorp has existed for 15 years and enjoyed steady profits for the years leading up to the recent oil industry downturn. DrillCorp was one of the many companies that filed for Chapter 11 bankruptcy. Fortunately for DrillCorp, it was able to work out favorable terms with its creditors and emerged from bankruptcy on solid footing. In early 2015, DrillCorp’s geophysicist identified the Mantle prospect in Jefferson County, Texas. Despite its extensive history of oil and gas development since the Spindletop discovery in 19013, Jefferson County had not been heavily explored since the early 2000’s. The early 2000’s had seen oil and gas companies drilling wells to produce natural gas from the Hackberry sand at about 11,000 feet subsurface. Geophysicists would analyze data sets to find “bright spot” anomalies in the data that were represented graphically as actual bright spots, and further analyze them to determine whether this was the result of a gas sand which could be drilled and produced. Due to subsequent advances in data processing, it was possible in 2015 for the geologists to identify potential gas sands which had not been identifiable in 2000. The Mantle prospect was the result of this activity, as Mantle identified several potential gas sands within the contract area.

1 A JOA is a written contract between cotenants or separate owners concerning a variety of matters, including drilling, allocation of expenses, operations, etc.

2 The “Contract Area” of a JOA is certain described lands that the parties to the JOA have interests in and will explore for and develop oil and gas.

3 The first commercial development of oil and gas in Texas occurred at Spindletop oil field in Beaumont.
Meridian is a West Coast-based investment group that invests in hydrocarbon projects. It is new to investing in Texas, but has had great success investing in shale gas recovery in Wyoming and West Virginia. Meridian is engaged in venture capital and is known for having a voracious appetite for risk. Meridian also has the attractive credential of successfully working with Exploration & Production companies after they have exited bankruptcy.

The Contract Area of the JOA between DrillCorp and Meridian is in Jefferson County, Texas. The basin is rich with layers of sandstone\(^4\) and shale\(^5\), with the shale resting thousands of feet beneath the sandstone. The sandstone is generally much cheaper to produce than the shale because the sandstone is closer to the surface than the shale—which means less drilling, drill pipe, etc.—and horizontal drilling and hydraulic fracturing\(^6\) are not required for production, which are requirements for meaningful production from shale formations.

The development plan that DrillCorp presented to Meridian is to drill a mix of 20 vertical and horizontal wells in the Contract Area. The development plan does not specify the order of the wells to be drilled nor the ratio of vertical to horizontal wells, but there was an oral understanding between the parties that the appropriate type of well would be drilled “when it was logical based on the price of oil.”

The JOA that the parties signed sets out the parties’ agreement to operate their interests in the Contract Area. The parties designated DrillCorp as the Operator of the Contract Area because of DrillCorp’s experience in both conventional\(^7\) and unconventional\(^8\) hydrocarbon development.

DrillCorp, as Operator under the JOA, drilled two vertical wells in the Contract Area. Prior to drilling the wells, DrillCorp sent Authority for Expenditures\(^9\) (“AEFs”) to Meridian who then had 30 days to review the AFE and consent to participate. Meridian elected to participate in both wells.

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\(^4\) Sandstone is very hard (it is rock, after all) but it is very much like a sponge. The porosity and permeability of sandstone make it an ideal reservoir rock for holding hydrocarbons, and the permeability (the interconnectivity of the pores) of sandstone allows oil and gas to freely flow into the well bore.

\(^5\) Shale is also a very hard rock but is much less like a sponge than sandstone. Shale is porous but has low permeability, therefore hydrocarbons find it much more difficult to flow between pores. Hydraulic fracturing technology allows parties conducting drilling operations to create fractures in the shale formation, which artificially creates permeability in shale in order to more economically recover hydrocarbons found in shale.

\(^6\) “Hydraulic fracturing,” or “fracing,” is a process where water, proppant (ex: sand), and chemicals are pumped into a well bore and forced into rock underground to fracture the rock. Proppant then enters the fractures and holds them open so that hydrocarbons escape the rock and flow up the well.

\(^7\) “Conventional” development is the traditional vertical “oil wells” people think of when picturing oil and gas development.

\(^8\) “Unconventional” development involves using techniques other than conventional techniques to extract hydrocarbons from underground, such as fracting horizontal wells.

\(^9\) An “Authority for Expenditure” is a document prepared by a party to the JOA for the purpose of estimating the costs to be incurred in conducting an operation under the JOA.
Well #1 was drilled in June 2016 within the $2.5 million dollar estimated budget provided in the AFE and DrillCorp and Meridian evenly split all costs. However, Well #2, which was drilled in November 2016, exceeded the costs estimated in its AFE by $750,000 (30%) for a total of $3,250,000 development costs for that well. Both wells produced for a while, but production has slowed and the wells have only been marginally profitable.

The $750,000 excess in costs for Well #2 surprised Meridian because Well #1 was developed within budget. Meridian received the expense invoice on November 30, 2016 and still has not paid for its share of these cost overruns. DrillCorp contacted Meridian requesting payment and Meridian stated that it wanted to inspect DrillCorp’s well records before paying their share of costs. DrillCorp informed Meridian that pursuant to the JOA, Meridian has the right to look at the records for wells that it participates in and therefore to “come on down” anytime that they would like to review the records. Meridian did not “come on down” to view the records on that occasion.

Based on the unimpressive returns of the conventional wells drilled and after reading story after story about the success of fracing in Texas, Meridian wished for DrillCorp to begin fracing the shale formation in the Contract Area. The marginal profits from the first two wells are obviously not what the parties were expecting, but DrillCorp was not discouraged by the lack of success. DrillCorp disagreed with Meridian’s opinion about moving to unconventional development and instead called Meridian and told it that DrillCorp was going to drill a third vertical well in the Contract Area. A drilling rig was on location and Meridian did not respond within the two-day\(^\text{10}\) response period as required under the JOA, so Meridian was deemed a Non-Consenting Party\(^\text{11}\) that would not share in the costs or production of the well without paying a non-consent penalty.\(^\text{12}\) In January 2017, DrillCorp decided to take the risk as the only participating party in the well and shouldered all of the costs.

Well #3 is a good producer and is much more profitable than Wells 1 and 2. DrillCorp’s costs for the well totaled $3,000,000. Meridian now “wants in on the action” but does not want to pay the steep 400% penalty that a Non-Consenting Party must pay under the JOA to opt-in to the well. The penalty amounted to $6,000,000 (400% of 1,500,000, i.e. four-times what would have been Meridian’s share of Well #3’s expenses had Meridian participated in the well). Meridian contacted DrillCorp about waiving a portion of the Non-Consent penalty, to which DrillCorp responded, “Settle up on your outstanding portion of the costs for Well #2, and then we can talk.”

Shortly after this brief conversation, Meridian requested the records for Well #2.

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\(^{10}\) Under the JOA, parties only have two days to consent if a drilling rig is on site.

\(^{11}\) A “Non-Consenting Party” is a party to a JOA who elects not to participate in a proposed operation.

\(^{12}\) A “Non-Consent Penalty” is a penalty that a Non-Consenting Party must pay to the other parties of the JOA in order to participate in a well that the Non-Consenting Party did not participate in.
Meridian again contacted DrillCorp, but this time it was to inform DrillCorp that Meridian was in talks with a third party and was considering whether to propose drilling a horizontal well to pursue the hydrocarbons that DrillCorp had predicted were in the shale formation in the Contract Area. DrillCorp responded that it would entertain a proposal from Meridian, but that the Meridian “should not get their hopes up.” On March 17, 2017, Meridian sent DrillCorp a proposal for the drilling of a horizontal well in the Contract Area to pursue the well-advertised success that has been found in Texas shale. Since there is no longer a drilling rig on site, pursuant to the JOA, DrillCorp has thirty days from receipt of the proposal to inform Meridian whether it plans on participating in the well.

The development of wells by the individual parties substantially increases the risk to the participating party solely bearing dry hole\textsuperscript{13} costs. This outcome is undesired by both parties and each is eager to find a solution that allows the parties to confidently move forward in joint operations. It was clear that the parties needed to meet to discuss the future development of the Contract Area after Meridian sent its proposal to DrillCorp. The lawyers for both parties have agreed to meet to negotiate several key issues before moving forward.

\textsuperscript{13} A “dry hole” is a well that is not capable of producing hydrocarbons in sufficient quantities to justify continued development of the well.
DrillCorp is more than upset with the way Meridian has been conducting itself. DrillCorp felt that the two parties had come to a consensus that they would trust DrillCorp’s expertise in exploration and production, and now Meridian is delinquent in paying its proportionate share of expenses and is trying to plan the development of the Contract Area—that is DrillCorp’s job as Operator!

It is important to keep in mind that DrillCorp has other operations outside of the Contract Area. DrillCorp has a few other projects that are ongoing and is actively pursuing other potential projects. Shouldering the full costs of development of a well because Meridian decides not to participate is not something that DrillCorp wants to have to do again because it has limited funds and its loans for the development of the Contract Area were taken with the understanding that Meridian was going to be sharing in development costs. DrillCorp knows that it is lucky that completing Well #3 without Meridian’s participation paid off, but DrillCorp is not going to make a habit of solely shouldering the costs of development.

**Late expenses**: Under the JOA, if a party to the JOA fails to pay its share of costs within 120 days after an expense statement is delivered to such party, the other parties of the JOA have the right to offset such delinquent party’s unpaid share of expenses from the proceeds of production until the amount owed by such party—including interest which starts accruing on day 121—has been received.

DrillCorp does not wish to exercise this power granted under the JOA because it would worsen an already damaged relationship between the parties. DrillCorp understands that Meridian may be frustrated with the unexpected cost overrun of Well #2 and that the well is not a great producer, but cost overruns are common in this industry. The cost overruns were caused by an increase in the cost of steel. DrillCorp did not have enough drill pipe stockpiled for Well #2 and had to purchase drill pipe at a higher price. The AFEs going forward will take into account the increase in the price of steel, so the increase in the cost of drill pipe will not be a surprise to Meridian.

DrillCorp is entitled to recoup Meridian’s share of cost overruns under the JOA, which means that Meridian owes DrillCorp $375,000. DrillCorp is keenly aware of the time value of money and would prefer a lump sum before April 1, 2017. However, if necessary, DrillCorp is willing to spread this amount into monthly payments over the next 6 months without interest to make this an easier pill for Meridian to swallow.

To show that DrillCorp is reasonable, DrillCorp is open to establishing a limit on the amount of cost overruns that Meridian will be liable for which is common industry practice. DrillCorp is open to limiting Meridian’s obligation to share cost overruns up to 20%. Any portion of a cost overrun that exceeds 20% will be the sole responsibility of DrillCorp. A 20% cap is ideal, but DrillCorp is willing to cap at 10% if necessary.
Time is ticking for Meridian to pay its share of the cost overrun for Well #2 and DrillCorp hopes that Meridian will be reasonable about this. The 120th day after the delivery of the expense statement is approaching and DrillCorp will do what it must in order to recoup its costs for Well #2.

**Non-Consent Penalty:** Meridian had the opportunity to review the language of the JOA before signing and agreed to the 400% penalty that a Non-Consenting Party must pay to opt-in to a well in which it originally chose not to participate. Of course, now that DrillCorp has a good, steady producer with Well #3, Meridian would like to participate in Well #3 without paying the steep penalty. If it would not negatively affect DrillCorp in the future, DrillCorp would stand its ground and enforce the provisions of the JOA.

However, given the fact that Meridian has great interest in conducting expensive fracing operations in the Contract Area and the fact that there is no telling whether such wells will be successful, there may be a time in the future that DrillCorp may wish to not participate in a well. It would be DrillCorp’s luck that the well that DrillCorp does not participate in is a huge success and DrillCorp would like the opportunity to opt-in to the well without having to pay a 400% penalty. At a 400% penalty rate, if DrillCorp were to opt-in to a horizontal well that targets the shale in the Contract Area—which is a much more expensive endeavor than a vertical well into the shallower sandstone—DrillCorp would likely have to pay more than $10,000,000 to do so.

There is a balance between protecting DrillCorp in the future and dissuading Meridian from using a “wait and see” strategy to see if DrillCorp is successful in drilling future wells. Also, DrillCorp would like to find a way to entice Meridian to pay the penalty for Well #3 because it will be a nice, unexpected amount of income that will hedge against the possibility of Well #3 untimely reducing production, although DrillCorp thinks Meridian will not “take the bait” at a 400% penalty. DrillCorp wants you to work your magic and negotiate for as high a penalty as possible, but DrillCorp will not accept a penalty for Well #3 of less than 300%.

The typical arrangement is a 100%–300% non-consent penalty. DrillCorp thinks a 200% non-consent penalty for all future wells—thus excluding Well #3—is ideal to discourage Meridian from taking advantage of DrillCorp in the future and at the same will decrease any penalty that DrillCorp may have to pay in the future. If Meridian agrees to pay a 300% penalty to opt-in to Well #3, DrillCorp is willing to decrease the penalty to 150% for all future wells, whether vertical or horizontal.

**Future Development of Contract Area:** Ever since they signed the JOA, Meridian has been pestering DrillCorp about how soon they would attempt an unconventional well and get their hands on the well-advertised success of Texas shale. In fact, despite the parties agreeing that DrillCorp would be the Operator of the Contract Area, Meridian is now trying to circumvent that understanding with the recent proposal that it sent to DrillCorp.
DrillCorp has become much more risk-averse (as much as one can for an exploration and production company) since its experience in Chapter 11 bankruptcy. DrillCorp wishes to have a long, successful history and thought that pursuing unconventional plays at the beginning of development without first attempting to produce using vertical wells would be a waste of money. Look how that has played out! Well #3 is a good producer for the Contract Area, which is why Meridian is now trying to find a way to opt-in to the well without paying the steep penalty that it agreed to pay in the JOA.

DrillCorp knows that under the Subsequently Created Interest provision of the JOA, a party that is responsible for creating a new interest in the Contract Area alone bears the burden to pay such interest. Therefore, if DrillCorp elects not to participate in Meridian’s proposal to drill a well and Meridian hires a third party to drill the well for Meridian, Meridian will be responsible for paying the third party for as long as the third party has an interest in the Contract Area. DrillCorp did some research about the operators that Meridian has worked with in the past and discovered that Meridian has worked with Salem Drilling Co. several times. Meridian did not divulge the name of the third party that it was in talks with, but DrillCorp certainly hopes that it is not Salem. DrillCorp was in joint operations with Salem in the past and Salem’s inferior operating skills created headache after headache for DrillCorp. DrillCorp is not sure whether Meridian’s proposal is a bluff or whether Meridian is serious about going down this road. Regardless, DrillCorp wants to be the Operator of the wells in the Contract area and certainly does not want Salem anywhere in the Contract Area.

With that in mind, given the news of great success of production from shale development near the Contract Area, DrillCorp thinks now is as good of a time as ever to drill a horizontal well in the shale formation, so Meridian’s proposal is not totally uninvited. The next well that DrillCorp is going to drill in the Contract Area is going to be a horizontal well that will frac the shale formation under the Contract Area. DrillCorp was waiting until oil prices rose to a sufficient level that allowed them to establish a larger borrowing base for reserve based lending14, and prices have reached a sufficient level. However, drilling unconventional wells will likely cost between $5 to $6 million dollars per well—potentially more than twice as much as vertical wells.

Given this increase in cost and Meridian’s recent reluctance to pay its complete share of costs when billed, DrillCorp is going to exercise its rights under the JOA to demand that Meridian advance its respective share of the estimated expenses for each future well. This will require Meridian to pay DrillCorp in advance for Meridian’s share of expected expenses during the next succeeding month. DrillCorp’s obligations as Operator do not include acting as banker for Meridian and Meridian should understand DrillCorp’s position from both business and legal perspectives.

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14 Reserve based lending (RBL) is a type of financing where a loan is secured by the undeveloped reserves of oil and gas of a borrower.
DrillCorp thinks that it would be unwise right now to agree to more than one unconventional well right now. DrillCorp is open to discussing a certain number of wells in a future conversation after the parties see the success of the first unconventional well, but not before. DrillCorp realizes that there is always the risk of drainage by a neighboring land and needs to make a move to protect the parties’ investments in the Contract Area. Hopefully after this conversation, Meridian will have a better understanding of DrillCorp’s interests in the Contract Area and will be satisfied for now with an agreement that DrillCorp’s next well will be an unconventional well.

*Do not bring in any other provisions of JOA forms. The only provisions necessary for this negotiation are provided in the General and Confidential facts.

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15 Drainage occurs when oil and gas production from one tract of land removes hydrocarbons from beneath a neighboring tract of land, thus “draining” the amount of hydrocarbons that were beneath the neighboring tract of land.
ROUND 1

Confidential Facts for the Attorneys Representing Meridian Investments

Up until the success of Well #3, Meridian was losing faith in the potential for success in the Contract Area and in the competence of DrillCorp as well. It seemed like DrillCorp was “all talk” and that DrillCorp’s sales pitch at the NAPE Expo had duped Meridian into investing in a “money-disposal project.” And just when Meridian was losing faith and decided not to participate in Well #3, of course DrillCorp finds a good producer.

Non-Consent Penalty: Meridian was quite aware that the non-consent penalty in the JOA was above the average for non-consent penalties. Meridian agreed to the steep penalty as a way to hopefully motivate DrillCorp to participate in drilling unconventional wells that Meridian proposes, and Meridian thinks the big money is just waiting for them in the shale formation. However good of a strategy this may have been, it has totally backfired and now Meridian is on the hook for $6,000,000 to opt-in to Well #3!

Meridian has renewed confidence that DrillCorp knows what it is doing, and Meridian is sure that DrillCorp knows that this steep of a penalty can harm DrillCorp in the future: if DrillCorp were to opt-in after not participating in a horizontal well that targeted the shale in the Contract Area at the 400% penalty rate, DrillCorp would likely have to pay more than $10,000,000 to do so. Therefore, Meridian thinks that DrillCorp will agree that this penalty should substantially decrease for all future wells and Meridian is hopeful that DrillCorp will agree to the decrease for Well #3 as well. The typical arrangement is a 100%–300% non-consent penalty, and Meridian is hoping to agree to an amount at the lower end of the spectrum. Meridian would like to amend the JOA to provide for a 100% non-consent penalty in the future but would be satisfied with a 200% penalty.

The absolute highest non-consent penalty Meridian will pay for Well #3 is 300%, but that is only if the parties agree that the non-consent penalty for all future wells will be reduced to no more than a 150% penalty. A non-consent penalty to opt-in to Well #3 that is greater than 300% is simply not economical to Meridian and Meridian will forego opting-in to the well.

Late Expenses: Meridian inspected the records for Well #2 and saw that the drill pipe used for the well cost substantially more than DrillCorp had estimated in the AFE that it sent to Meridian. It is unclear from the records what caused the price of the pipe to increase. Whatever the reason is, Meridian has never been involved with a project that had cost overruns of more than 10% and is shocked that it will have to pay half of a 30% cost overrun for Well #2 according to the JOA.

Meridian needs to find out from DrillCorp exactly what caused the difference between the allocated cost for pipe in the AFE and the actual cost shown in Well #2’s records.

If DrillCorp provides them with a valid reason, Meridian is willing to pay for its share of the cost overruns for Well #2, which is $375,000. Under the JOA, the Operator has the right to offset
expense amounts that are overdue from a delinquent party’s share of production, with interest. To avoid the interest and spread out the loss, Meridian is willing to pay equal installments over the next 6 months to pay off its share of the cost overrun for Well #2. Meridian believes this is a reasonable accommodation given the fact that the cost overrun was quite significant and DrillCorp never provided an explanation or warning of the overrun in advance.

Meridian wants to protect itself from having to share excessive cost overruns in the future. Meridian has heard of parties putting limits on cost overruns in JOAs and would like to include such a limitation in the JOA. Therefore, Meridian would like to add a provision to the JOA that limits Meridian’s obligation to share cost overruns up to only 10%. Any portion of a cost overrun that exceeds 10% will be the sole responsibility of DrillCorp. This will hopefully motivate DrillCorp to provide more accurate AFEs and drill the wells within budget.

**Future Development of Contract Area:** Meridian is now more trusting of DrillCorp’s ability to find hydrocarbons, and Meridian thinks that now is the time to strike and begin unconventional operations. Meridian sent its proposal hoping it would show DrillCorp that Meridian was serious about drilling a horizontal well to start to frac the shale formation. This could be viewed as a bluff, but Meridian sees it as creative motivation. Meridian has been discussing the possibility of drilling the proposed well with Salem Drilling Co., a company that Meridian has worked with in the past with much success. Salem told Meridian that DrillCorp likely would not want Salem to be conducting operations in the Contract Area on behalf of Meridian because Salem and DrillCorp have some negative history. This is great news for Meridian and Meridian’s lawyers plan on using it in the discussion to hopefully give DrillCorp even more motivation to develop Meridian’s proposed unconventional wells.

Under the Subsequently Created Interest provision of the JOA, a party that is responsible for creating a new interest in the Contract Area alone bears the burden to pay such interest. Therefore, if DrillCorp elects not to participate in Meridian’s proposal to drill a well and Meridian hires a third party to drill the well for Meridian, Meridian will be responsible for paying the third party for as long as the third party has an interest in the Contract Area. If DrillCorp were to opt-in later and the well that Meridian proposed was a success, DrillCorp would receive its half of production (after paying the non-consent penalty, of course) and Meridian would be stuck paying the third party out of Meridian’s now reduced interest in the well. To sum up a long story, this strategy is not ideal for Meridian.

Meridian wants to gauge DrillCorp’s interest in drilling unconventional wells. Meridian wants to know whether DrillCorp is going to drill unconventional wells soon and if not, why not? The Contract Area now has a well that is a good producer and Meridian hopes this success will make DrillCorp more comfortable investing in an unconventional well. To further entice drilling horizontal wells in the shale formation, Meridian would support DrillCorp’s decision if DrillCorp were to require advance payment for horizontal wells since those are more expensive to drill (up to two times more expensive) than vertical wells. If necessary, Meridian would support DrillCorp’s
demand to require advance monthly payment for vertical wells which DrillCorp has the right to do under the JOA.

Meridian wants the next three wells that are drilled in the Contract Area to be horizontal wells into the shale formation in order to frac the shale. Meridian is eager to develop the shale formation in order to cash-in on the great resource that is making headlines. If DrillCorp is not willing to commit to three horizontal wells in the Contract Area right now, Meridian will leave the negotiations satisfied if DrillCorp just agrees that the next well that DrillCorp will drill will be a horizontal well that targets the shale formation in the Contract Area. Given the fact that fields near the Contract Area have successfully produced from the shale formations and the fact that oil prices are rising, Meridian sees this as the perfect time to target the shale. The parties also need to act soon to prevent drainage\(^{16}\) by neighboring tracts of land. Otherwise, Meridian may reluctantly have to move forward with bringing in a third party operator.

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\(^{16}\) Drainage occurs when oil and gas production from one tract of land removes hydrocarbons from beneath a neighboring tract of land, thus “draining” the amount of hydrocarbons that were beneath the neighboring tract of land.