Much of the information that follows will open the door to many more questions. The purpose of this document is to ignite strong interest and renewed commitment for independent and formal investigations into what really occurred with the Deepwater Horizon oil well blowout. Several irrefutable and previously unknown facts have come to light that clearly demonstrate this IS a door worth opening.

Getting these new found facts examined has even greater importance in light of the federal trial over the spill commencing on 27 Feb and BP’s determination to settle all claims to eliminate the need for the trail.¹

The attached article, entitled An Expert’s Analysis of ROV Film Footage Taken at the Deepwater Horizon Oil Spill Disaster Site, is being forwarded to you by the Gulf Rescue Alliance after having had its advisors examine the validity of the analysis. While further expert examination of this material will be required (which we do not have the resources for) we believe this material strongly points to an URGENT AND IMMEDIATE need for further action.

AN OVERVIEW OF THE IMPORTANCE OF THE ATTACHED ARTICLE

In Jan 2011, Congressional Representatives including John Shimkus & Fred Upton (Chairman of the House Committee on Energy & Commerce) and several other members of Congress received a letter of urgency from one of the foremost Geohazards Specialists in the world with 30 years professional experience in the oil and gas extraction industry and geological hazard analysis, BK Lim. Lim’s letter warned of the instability and fractured state of
the Gulf of Mexico’s seafloor resulting from indiscriminate deep-water drilling and plugging activities of the Macondo wells by BP before, during and after the Deepwater Horizon oil blowout.

Since then, congressional investigations into BP’s Macondo blowout and mega oil spill disaster have, to our knowledge, mostly been concluded and any legislators who may have had a genuine concern with unanswered questions have seemingly given up the pursuit of further investigations. It is business as usual in Washington, DC with the first new deep water drilling permits now being acquired by the perpetrators who still have unsettled business related to the worst environmental disaster the U.S. has ever known.

Why have investigators given up the pursuit? It appears that even industry experts are not taking the time to decipher the confusing forensics surrounding the largest oil spill in history. And, even if some were willing, they would find it difficult to navigate through the fog of falsehoods, inaccuracies and what appear to be deceptive decoys carefully placed on the trail. The media steers clear of investing the time necessary to sort out the illogical “facts.” The very complexity of it is its best protection from critical scrutiny.

There are, however, a handful of experts and investigators outside the oil industry’s payroll and government ‘oversight’ who have been methodically sifting through mammoth quantities of data for the past four months to get the most intriguing questions answered:

- **WHY** did BP officials testify to Congress that there was only one well when there were three?
- **Why** was the 3rd well drilled without a permit?
- **Which** of the 3 wells was actually shown to be capped at seabed level in July of 2010?
- **Was** the rogue well factually sealed in Sept?
- **Since** all casing was blown out of the rogue well and there is nothing for any mechanical instrument to connect on to, there was no possibility of capping the well which means that huge volumes of oil are continuing to flow into the Gulf unabated. **What** are the strategic plans to get this under control?
- Why were many of the ROV video records of the blow out incident doctored with falsified details before they were turned
over to congressional investigators?

- Why were the ROV cameras re-directed showing a well with completely different coordinates to demonstrate that the well was capped?
- Which well was the DWH actually hooked up to when the blow out took place on 20 April 2010?

One source of amazing data leading to answers to these questions was discovered only a few months ago from an insider’s tip. [http://oilspillhub.org](http://oilspillhub.org) is a website for scientists and engineers that was registered on 21 June 2010 under Purdue University. Here was a goldmine of evidence, hitherto left unanalyzed. This underwater ROV video footage leading up to and following the BP disaster was provided to Congress by BP, and the U.S. Senate Committee on the Environment and Public Works subsequently forwarded it to Purdue University so that it could be posted on the site and made available to industry experts and scientists.

It appears Congress did not have the resources to be able to decipher the confusing images and, lacking access to the required expertise, made the BP oil spill ROV footage available to Purdue University for access by persons with the training and experience to understand it.

Lim has spent hundreds of hours carefully analyzing all of the BP video footage on this site and has unearthed numerous anomalies and contrary information exposing that many of the official statements and accounts of what occurred are physically impossible.

Lim and other experts have concluded that several sections of the ROV footage were doctored and inserted amongst actual footage of the disaster area. This footage was not only submitted to congressional investigators but also utilized in TV media news reports. The careful placement of spliced in false images (changing dates, times and locations) made it very difficult for even experts to analyze the data (let alone challenge BP’s testimony and Coast Guard accounts) or to determine what truly caused the disaster. In other words, anyone not thoroughly experienced with analyzing images of pipes, risers, blowout preventers and seabed conditions more than a mile beneath the ocean would utterly miss what, to a professional, would be obvious. Similar to a trained doctor reading an X-Ray who can easily see small fractures and other anomalies that the untrained eye would miss, experts trained in analyzing underwater wells through ROV images, as well
as experienced oil and extraction professionals, can quickly see anomalies that are either physically impossible or that show situations to be or have occurred differently than were reported.

This is where one individual with 30 years experience in the field stands out in unraveling new information that, while almost too incredible to be believed, tells a new and revelatory story of the how and why of the BP Gulf oil blowout crisis.

Below are just a few of the new facts that have come to light through BK Lim and his team’s investigation:

a. A 3rd Macondo well (entitled Well BE) was drilled without a permit. This is illegal. It is this well that was connected to DWH that had the blowout.
b. Nearby Well A and Well B, which had MMS permits, had to be abandoned and capped earlier than the blowout due to geohazard risks.
c. Congressional Records, MMS records and BP testimony omit the existence of a 3rd well and official public statements asserted there was only one well—the one that was reportedly capped.
d. Evidently, BP tried to cover up the fact of 3 wells by calling them “3 leaks” in the fallen riser.
e. The original blowout occurred on the 20th of April and yet there was no oil leaking from the well as a result. The oil did not begin to gush into the Gulf until the 22nd of April. Per Lim, the only way that a 5-story high and multi-ton’d BOP could have been thrown over 70 feet away from its original position is if an artificial detonation of large magnitude was purposefully set.

As a final note, while Gulf Rescue Alliance (GRA) encourages further peer review of this information, this material is wholly based on actual evidence that is substantiated by video posted on the Purdue University site and what truly appears to be credible analysis of the images. On that basis, this information has been packaged/formatted and released by GRA because of its significance and value for the upcoming oil disaster trial--to make available to other investigators and to receive the attention it deserves.
We truly hope you take the time to examine this information on behalf of all life in the gulf region who are still under this ongoing threat.

**AN EXPERT’S ANALYSIS OF ROV FILM FOOTAGE TAKEN AT THE DEEPWATER HORIZON OIL SPILL DISASTER SITE**

By BK Lim Bio Hazard Specialist Research Team (first drafted in June 2010, revised 29 Jan 2012)

The chart below was compiled from official reports released by BP regarding the Deepwater Horizon oil blowout. The notes in red font were added by BK Lim, based on facts which can be seen in the actual ROV footage provided by BP to Congress but which are contrary to what BP has reported.

![Chart and Diagrams](chart_and_diagrams.png)

**The three oil leaks**

1. RIT tool installed May 16 lessens oil flow from largest leak; containment dome failed here.
2. Leak at broken end of riser was capped May 5.
3. Leak near top of BOP; “top kill” procedure used here.

![The three oil leaks](the_three_oilLeaks.png)

Figure 165-0 One of the many rendition of BP’s fairy tale of 3 mysterious leaks on the Riser. See the variations in the leak numbering; design to confuse visualisation.

Of all the inaccuracies that came out of the Gulf disaster, the most preposterous has been the “3-leaks-on-the-riser” story. Figure 165-0a to 165-0c were the first few schematic illustrations...
of BP’s blowout incident provided by BP to the public. To oil and gas extraction industry professionals, the illustrations defied logic to such an extreme that it was believed the schematics were deliberately drawn by cartoonists to confuse the uninformed public. The patchwork of realities resembled a makeshift car hastily assembled from parts of different size vehicles. Obviously a mini car body does not match the oversize truck tires. It is obvious the 5-inch drill pipe at leak (3) cannot be the same 21-inch diameter riser (actually a well casing) at leak (2).

There were many controversial circumstances surrounding the sinking of the burning rig (DWH) and the impossibly unlikely sudden breaking of the super-strong riser in calm water. One of the most illogical was how a third open-ended leak, leak (3), could be possible when it was in a location of the riser that was beyond the completely severed riser at the second leak (2)? See fig165-0c.

There is video footage of well #3 that can be seen to have had the latitude and longitude coordinates tampered with and changed, and video footage of the same well that has coordinates that have not been doctored. Comparing the footage, one can see that “Leak (2)” has to be the blown crater of well #3. This is irrefutably shown in Figure 165-5 with the right coordinates in the few un-doctored videos we located.

Describing the 3 wells as “3 leaks on a badly twisted riser” would be one way to hide the fact that there were 3 wells. Per government records, BP had been given permits for two of the wells and, prior to the blowout, these two had already been capped. The 3rd well was the one that blew out and, per government records, BP had not obtained a permit for it prior to drilling.

If there were really 3 leaks on a single riser, BP could have easily reduced three into one controllable leak at the source by cutting the riser at the top of the blowout preventer (BOP). That was precisely what BP did at the end of May to install the LMRP cap (Lower Marine Riser Package) on 3 June 2010. But why wait for 40 days? Why would BP go through non-standard and easy-to-fail attempts such as the top kill, junk shots, hot hats, etc? Why wait for 87 days before shutting down the flow at well A on 15 July? Why were there no massive oil spill or gas leaks before 2200z (1700 CDT) 22 April 2010?

The ROV inspections of the wellhead, marine riser and BOP in the immediate aftermath of the incident show that the mega oil spill could have been easily averted with several standard industry options. It was the sort of controllable rig blowout-fire situation the industry expects and routinely train for. It could have been recovered safely without ending in a disastrous mega oil spill.

The initial gas blowout (20 April 2010), which killed 11 drilling crew on the burning Deepwater Horizon rig, did not unleash the massive oil spill. It is my considered opinion, based on the 100’s of hours spent analyzing the hundreds of hours of underwater ROV footage of the 3 wells, the crater, the BOP, and riser, that a detonated explosion within the well on the 22nd of April, shortly after 2200z (1700 CDT), is what induced a bottom hole blowout that unleashed
the full power of the gushing oil from the Macondo reservoir. With all of the data to hand, nothing short of a massive, purposefully detonated explosion could have created that effect. ***

Because the BOP was already in pieces scattered over the seafloor after the 22 April bottom-well blowout, all ROV videos showing the still standing BOP with the bent riser (without the gas leak) from the 23 April till mid May 2010, can be seen to be relooped footage recorded prior to the 22 April explosion shortly after 1700 CDT.

PART II OF ARTICLE I

SEE IMAGE 165-1b and 165-1a

BP's “3 leaks on a single riser” are technically impossible.

BP claimed the first leak, leak (1), was at the kink of the riser (bent riser) on top of the 70-ft blowout preventer (BOP). BP admitted that most of the oil gushing out into the Gulf was from the second, leak (2). The smaller gas leak at well A could not be capped until the real rogue well (BE), aka leak (2), was sealed or bottom-killed at 18,000 ft bsl (below sea level) (reported since July 2010).
Some photo evidence confirming BP's distortion of the truth in the Gulf Mega Oil Spill disaster. Such elaborate subterfuge had to be planned months if not weeks, before the 20 April 2010 gas blowout. Wilful Blindness from the regulators had to be assured prior to the incident.

**Figure 165-1b Isometric View**

- Information on the 3 leaks & twisted riser provided by BP (end of April 10)
- 3rd well loc well BE Fluid plume venting from Riser
- leak (2) After bottom hole blowout on 22 April intentionally induced with a detonation in well (Plan B)

---

**Figure 165-0a Map View**

- Open ended Riser standing vertically from seafloor
- WHD blown off 3rd well crater
- Source info from BP

**Figure 165-0b Isometric View**

- Source info from BP
- Fluid plume venting from Riser
- Seafloor water depth = 5,000'

**The three oil leaks 165-0c**

- BP has been working to stop oil flowing from three leaks in a riser, or pipe, connected to the well on the Gulf of Mexico seabed.

1. RIT tool installed May 16, lessens oil flow from largest leak; containment dome failed here
2. Leak at broken end of riser was capped May 5
3. Leak near top of BOP; "top kill" procedure used here

**What is the riser?**

- About 5,000 ft. (1,524 m) of riser, or special drilling pipe, connected to the well on the oil rig at the surface
- After rig accident, some of riser fell to the seabed still attached to the BOP; oil leaks from holes in the riser

---

Figure 165-0 One of the many renditions of BP's fairy tale of 3 mysterious leaks on the Riser. See the variations in the leak numbering; design to confuse visualisation.
The third leak (3) was just a puny gas leak flowing out of the open end of a drill pipe. Figure 165-0 gives the various schematic illustrations of what was stated to be the 3 leak points on the riser, based on BP-sourced information. Besides adding the labels for clarity, the only other item I added to figure 165-0a was the NW SE fault line. This fault line, as we shall see in later articles, was the critical factor in the shallow gas problems encountered in all the 3 wells.

Simple logic dictates that it was physically impossible for these 3 leaks to occur on a single riser from a single blowout. Certainly not the way BP explained it. Figure 157 in my article entitled Another Physical Impossibility - 2 Leaks On The Broken Riser gives some of the discrepancies noted on Leak (1) and Leak (2) as early as Aug 2010. Note that leak (3) was allegedly sealed by capping the open-ended drill pipe.

This information strongly suggests that, while BP had teams trying various predictably unworkable ways to “plug the hole”, teams on site were setting up another BOP and reattached the bent riser at well A.

(scroll to next page…)
Figure 165-2
The Marine Riser viewed from different perspectives.
A drilling riser is a conduit that provides a temporary extension of a subsea oil well to a surface drilling facility. The left picture shows the marine drilling risers laid out at a yard. 

Wikipedia

The different color stripes on the risers indicate differing amounts of buoyancy. The buoyancy keeps the entire riser system in more/less neutral buoyancy. The large-diameter pipe in the middle of each riser is the conduit for the drill-string, liners and casing to pass through. The risers are bolted together at the flange sections. The bolts are about as big as the arm of a very strong man. The nuts, which tighten things down, are the size of paint cans. from Drilling Ahead.com

Pictures below extracted from video footage at the Macondo disaster site.
In addition to the 6 discrepancies found in comparing leaks (1) and (2) in figure 157, here are a few more that strongly make the case:

• The open ended 5 inch drill pipe at leak (3) is of different physical dimension from the pipe (casing) at leak (2) and the bent riser on top of the BOP at leak (1). See the marked differences in figures 165-1b and 165-2. This means they could not have been attached to each other and, therefore, are not from the same set of mechanical equipment for a series of leaks on a single well’s riser.

• At leak (3) the 5 inch drill pipe should have been inside the 21 inch main riser pipe with the attached choke, kill, booster and hydraulic supply lines. It is physically impossible to have a long “naked” drill-pipe stripped off its 21-inch riser pipe casing at the mid-section of the riser string. More impossible still is the fact that it was sticking vertically out of the seabed with the weak gas plume. The naked standing drill-pipe could only be possible if it was ejected from the blown well itself.

• If the riser was carrying the same drill pipe string (5000 ft long), how did the pipe at leak (2) suddenly become several times larger than the drill pipe shown at leak (3), immediately after the blowout? This is physically impossible.

• In comparison with the other broken segments of the riser string lying on the seafloor, why was leak (2) so special and different if it was also broken from the same riser string? Fact: leak (2) could not possibly be from the same riser string.

• BP claimed that leak (3) was sealed by capping the drill pipe. One could then logically ask why couldn't the drill-pipe within the riser at leak (2) be similarly capped? There were many reasons they couldn't. The main reason? Leak (2) was not a leak but rather the blown crater of well no. 3 (well BE) and not the broken riser carrying the drill-pipe within.

• Leak (3) was undeniably an open ended, disconnected pipe just as leak (2) was. There could only be one severed open end in the riser segment still connected to the BOP. It can only be leak (2) or leak (3), but not both.

• How did the oil “jump” across leak (3) and continue to flow to leak (2) as illustrated in 165-0a and b?
• The later illustration (165-0c) which came out corrected the leak (3) anomaly by placing it after leak (2). Only problem is, then, how do you explain the “open ended pipe” at leak(2)?

• Figure 165-2 and BP's investigation report confirm that there were two 5-inch drill-pipes within the bent riser. This means that the drill-pipe string within the riser was already disjointed near the BOP. How could oil/gas flow through a disjointed drill-pipe to leak out at leak (3) more than 500ft from the BOP?

• The black oil plume at leak (2) was obviously more voluminous than the lighter orange-brown gas leak at leak (3) or leak (1). The color of the oil/gas plumes is consistent with the differences in the flow rate and volume noted in all the three leaks. Fact: the oil in each of the 3 “riser leaks” are not riser leaks but, in fact, from different ground sources.

• The videos show that the riser string was completely severed at several points and all the severed sections showed no gas/oil leaks. If Leak (1) was on the same riser string as leak (2) and leak (3), why was it not showing any oil/gas leaks until after mid May 2010 (more than 20 days later)?

• The earliest video on 23 April 2010 clearly showed a steep-sided blowout crater with no “surface” riser going into the crater. The oil-spewing pipe at the base of the deep crater, had to originate from the well below. With no visible supply of oil (through the surface riser), the obvious oil supply had to be vertically beneath the crater. This further confirms that leak (2) was the blown third well (BE). See the close-up view at figure 165-5.

• The bent riser on top of the BOP was not leaking at all in the early videos before BP publicly broadcast leak (1) in mid May (20 days later). If leak (1) at well A was the primary leak, it does not make sense to show the secondary leak (2) first. Not unless the primary leak (1) at the well was non-existent and the scene had to be set up first to portray what was being stated.

• Setting up well A as the “primary leaking well” was not in the original plan. It was a backup plan. This explains the more than 20 days media blackout on the supposedly primary leak(1).

• The riser piping could not have bent and twisted like a pretzel and yet still have remained intact.
• The riser string did, in fact, break at several places as seen in figures 165-1a and 1b. Again how could oil flow through these “severed discontinuities” in the riser? **Fact:** There was no oil flow until the 22\textsuperscript{nd} of April, as the ROV inspections showed.

• The clearest evidence is the photo of the vertically standing riser section (speared into the seabed). There was no oil spill emanating from it or in its vicinity. *This clearly refutes the official story that a neutrally buoyant riser with floats could dig itself beneath the seabed (like a buried pipeline) only to spew out oil hundreds of feet away. Again, this is physically impossible.*

• If the well was already gushing out oil from the instance of the first blowout on 20 April 2010, why was there no immediate oil spewing out of the broken riser as it was sinking. *The rig fire was in fact fed by more than 700,000 gallons (60% of max capacity) of diesel stored onboard the rig.* Why was more than 60% of fuel still onboard the rig at the end of its long 3 months drilling campaign? Why was BP so certain free flowing crude from the well was fueling the rig fire, despite all evidence to the contrary?

• It is now confirmed (see figure 165-3) that it took less than 16 seconds for the riser to fully bend from an upright (slightly inclined) position. The DWH (falsely reported as having sunk at 10:22 CDT) could not have sunk 5000ft to the seabed within a minute. Thus the riser pipe had to be deliberately broken near to the BOP; possibly less than 1000ft. Otherwise, how could a marine riser which could withstand 80 mph Hurricane Ida, break at mid-section in very calm water? A shorter break segment from the BOP could also explain the extremely fast bending event. Now the question is how did the riser break?

• The fact that there was no visible oil gushing out of the broken end of the riser as it sank, further confirms that the base plug at the bottom of the well had not yet breached completely (more of this in later articles) at 10:22 CDT 22 April, 2010.

• If this was the case, why did BP, blog forums and the Coast Guard repeatedly stress that “oil from the reservoir was freely flowing into the rig through the riser and feeding the intense fire on the burning rig”?

• ROV inspection of the BOP and the seafloor around well (BE) on 22 April 2010, showed no signs of gas plumes, blow holes or oil emanating from the well head. That would explain why the bent riser did not have any gas leaks on 22 April where most of the doctored-relooped footage were shown. Then 20 days later, BP showed the same bent riser with the orange-brown gas plume (at well A). If BP could turn
the gas leaks on and off, they should have been able to quickly stop the oil spill. It is my professional opinion that BP purposefully switched wells to publically stage the capping event on a well that never hit pay dirt.

• Even if the riser was still intact (despite the twists and bends), how could the supposedly “long riser string” plant itself inside a deep (at least 5m) crater without disturbing the overlying cemented drilling mud and sediment?

• BP’s schematics showed less than 4,000 ft of riser. What happened to the remaining 1,000 ft? Further the 700 odd ft segment from well A to well BE (crater) has a totally different degree of twisting and bends from the next 3,000 ft segment. A falling elongated but uniform body like the riser does not twist and bend midway in calm water. The bottom section had to break away first and the hanging riser dropped almost vertically under its own weight as depicted in the diagrammatic illustration of BP's deepwater horizon blowout published on 30 July 2010. Consequently, the “speared location” would be centered near its original base (or well). This, again, points to the location of the third well (BE) which was fraudulently depicted as leak (2) on a fallen riser. With so much irrefutable evidence, leak (2) cannot be just a secondary leak on the riser but is, in fact, the broken well itself.

There are many more flaws in BP’s official story but we shall reserve them for the coming articles. But how could entire teams of federal regulators and investigators, all fail to recognize and investigate the flaws of BP’s official version of the disaster?

You can fool all the people some of the time, and some of the people all the time, but you cannot fool all the people all the time. ~ Abraham Lincoln

ROV IMAGE AND ILLUSTRATION LINKS

165-0  http://webzoom.freewebs.com/gulfrescuealliance/DWH%20Timeline%20Documents/165-0%20Another%20rendation%20of%20the%20riser%20with%203%20leaks%20on%20a%20single%20riser%20by%20MCT%20copy.jpg

165-1a  http://webzoom.freewebs.com/gulfrescuealliance/DWH%20Timeline%20Documents/165-1a%20USCG_DWH2.%20debris%20field%20Evidence%2022%20detonation.pdf

165-1a alt  http://webzoom.freewebs.com/gulfrescuealliance/DWH%20Timeline%20Documents/165-1a.jpg

165-b  http://webzoom.freewebs.com/gulfrescuealliance/DWH%20Timeline%20Documents/165-1B.jpg
To keep this article short, we posted these figures earlier at the following links:

Figure 165-3 BP doctored relooped video to make-believe BOP was still intact at 3rd well after 2nd blowout

Figure 165-4 BP’s latest PR twist: DWH blowout disaster downgraded into an underwater pipeline burst

Figure 165-5 Undoctored videos confirm oil gushing blown crater was well#3 and not 2nd leak on the riser

Figure 165-5a Doctored videos of the same blown crater confirm elaborate deception

Figure 165-6 Even DNV was fooled by the fake relooped videos after the 22 April explosion.

\[\text{As the upcoming trial on Feb 27th in New Orleans has ended up in an impossibly burdensome 72 million pages of documents submitted to the Federal Court, this trial may or may not bring the most important information to light. The huge volume of forensics could make it virtually impossible for any one analyst to get a complete picture.}\]

\[\text{This, despite the fact that no meaningful change in plans for addressing future spills has been proposed, and with many extremely important and fundamental questions left unanswered about the current and on-going state of the well site.}\]

Additionally, no change in strategy of methods for cleanup of any future spills has occurred, despite catastrophic events directly resulting from the wholly inadequate cleanup response itself of the Deepwater Horizon blowout, and despite the fact that highly effective, non-toxic solutions for oil spill cleanup are available. Long approved by the EPA, these products have been purposefully and inexplicably barred by the EPA from use on the Deepwater Horizon catastrophe, while at the same time, the EPA has authorized and justified the use of the highly toxic chemical dispersant, Corexit. Corexit can easily be shown, scientifically, to be utterly destructive on all levels except for its success in hiding fresh oil beneath the surface.
As large quantities of new, fresh crude oil and Corexit continue to be found in the vicinity of the Macondo wells, (subsequently verified by laboratory tests as from the Macondo wells) many fundamental questions are unanswered and the disaster continues.

See GRA Editorials and Information packages at:

1. EPA Protocols for Oil Spill Clean Up More Toxic.
2. Fresh Oil Summary
3. Health Implications