

FCC Updates Rules Governing the Construction, Marking, and Lighting of Antenna Structures

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August 12, 2014

On August 8, 2014, the Federal Communications Commission ("FCC" or "Commission") adopted a *Report and Order* updating its Part 17 rules, which govern the construction, marking and lighting and maintenance of antenna structures. The FCC initiated a review of the antenna structure rules in 2010 intending to streamline the rules, improve compliance and enforcement objectives, and eliminate unnecessary and burdensome requirements for antenna structure owners. The revised rules affect compliance in numerous areas and will have the effect of harmonizing the FCC's requirements with the Federal Aviation Administration's ("FAA's") recommendations to protect air travel.

A number of the new rules will take effect only after the Commission publishes a notice in the *Federal Register* announcing the effective date following the completion of Office of Management and Budget review of new and modified information collection requirements. Otherwise, the rules adopted in the *Report and Order* will take effect thirty (30) days after notice of the *Report and Order* is published in the *Federal Register*, which has not yet occurred.

Antenna structure owners should be aware of how these rules changes affect the Commission's Antenna Structure Registration ("ASR") process and their compliance obligations regarding marking and lighting of antenna structures, antenna structure maintenance and inspection requirements and timelines, among other requirements. Below is a summary of the key rule changes affecting antenna structure owners.

1. ASR Process

The FCC made several rule adjustments to modernize the ASR process. The new rules focused on areas where FCC regulations may have conflicted with FAA recommendations or were simply out of date, for example by citing earlier FAA recommendations (*e.g.*, earlier FAA Advisory Circulars). Generally, the FCC updated its rules to defer to FAA recommendations for air safety requirements to promote safety while minimizing regulatory burdens for antenna structure owners.

- **Marking and Lighting Specifications**

The FCC's rules have been updated to require that structure owners comply with the marking and lighting specifications issued in the FAA's "No Hazard" determination and associated aeronautical study for new and modified structures. All references in the rules to structure owners complying with recommendations in FAA Advisory Circulars have been removed from Part 17 and the FCC's marking and lighting requirement will be consistent with the FAA's "no hazard" determination. However, the FCC has retained the right to exercise its own judgment and impose additional or different

requirements in limited circumstances to ensure structures do not pose an air hazard. The Commission declined to adopt a proposal giving structure owners latitude to adopt lighting configurations referenced in policy documents that reduce adverse effects to birds and other wildlife. (The FCC noted that it has not yet made a final determination as to what, if any, measures should be adopted that are focused on the protection of migratory birds.) The *Report and Order* emphasizes that changes to marking and lighting specifications on an ASR require prior approval from *both* the FAA *and* FCC.

- **No Retroactive Application of New Specifications**

Generally, going forward the FCC will not require existing structure owners to comply with new marking and lighting requirements after the structures have been authorized unless the FAA *recommends* compliance with the changed specifications for a particular structure. In particular, the *Report and Order* noted that the Commission will monitor the FAA's determination whether to retroactively apply changes to its Advisory Circular recommendations as a result of the FAA's 2012 Conspicuity Study reviewing new obstruction lighting techniques to reduce bird fatalities.

- **Height and Location Data Accuracy**

The *Report and Order* addresses the previous lack of definition of those "alterations" to existing antenna structures that trigger a requirement for FCC approval for the change. Specifically, the new standard will be that structure owners must receive advance FCC approval of any change or correction to a structure of *one foot or greater in height, or one second or greater in location*, relative to the existing information on the structure's ASR form. These are the same criteria for when a new aeronautical study and determination of "no hazard" by the FAA is required. The FCC declined to adopt any specific survey method for conducting site measurements to determine whether a potential alteration qualifies. Rather, the *Report and Order* provides that any survey method recognized by the FAA may be used.

- **Notifications of Construction and Dismantlement**

Structure owners will be required to notify the FCC within five (5) days of when an antenna structure reaches its greatest height, when a constructed antenna structure is dismantled or destroyed, or when there are changes in structure height or ownership. The FCC's current rules required structure rules to provide notification within 24 hours. The FCC recognized that while its rules may result in more accurate records, a five-day notice standard was set by the FAA, the expert agency on air safety, as sufficient to promote public safety.

- **Voluntary Antenna Structure Registration**

Currently, structure owners have the option to register structures even if not required by the FCC's rules (generally when structures will exceed 200 feet or certain lesser heights when close to an airport). The FCC considered, but ultimately rejected, precluding voluntary registrations, allowing structure owners to continue to voluntarily register their new structures. The FCC plans, however, to update the Form 854 to require future applicants to designate whether a registration is voluntary; but owners of previously registered structures need not refile or amend registrations to make such a designation after the fact.

Additionally, the FCC stated in the *Report and Order* that it would not serve the public interest to apply Part 17 marking and lighting requirements to antenna structures that are registered voluntarily. While the *Report and Order* makes clear that new registrations that designate that the filing is voluntary will be exempt from these rules, the *Report and Order* is somewhat less precise on this point of applicability regarding previous voluntary registrations, since the structure owners could not, when making the registrations, designate whether the filings are voluntary. Structure owners that have previously submitted voluntary registrations may withdraw them.

- **ASR Posting Requirements**

The *Report and Order* modifies ASR posting requirements to provide more flexibility for structure owners to choose the best place to post their registration number. The existing rule required that the ASR number be displayed “in a conspicuous place so that it is readily visible near the base of the antenna structure.” Through the rulemaking process, the FCC acknowledged that the base of the structure might not be accessible to the public and that it is the public that must be able to see the number. The new rules require that owners display the ASR number so it is visible to the general public at the closest point of public access near the base of the antenna structure, except that if there are multiple publicly accessible access points, the number must be posted at each location. The *Report and Order* clarifies that the closest publicly accessible location may be on a perimeter fence or access gate to the tower site. The FCC explained that where a single perimeter fence encloses multiple antenna structures, the ASR number for each structure must be posted at *both* the access point(s) *and* at the base of each structure.

Additionally, once the rules take effect, structure owners will be able to provide all tenants with electronic notice of the ASR number and an electronic reference to the official registration. Owners were previously required to send a copy of the registration to all tenants, a limitation the FCC recognizes is outdated and unnecessary in today’s marketplace.

2. Maintenance of Marking and Lighting

The *Report and Order* also modified requirements applicable to antenna structure marking and lighting inspection, maintenance, and recordkeeping. The key rule changes are summarized below.

- **Quarterly Inspection of Antenna Structure Lighting and Control Equipment**

The *Report and Order* adopts rule changes to establish a procedure whereby qualifying network operations center (“NOC”) -based monitoring systems may be exempted from the existing quarterly inspection requirements which apply to their automatic or mechanical control devices, indicators, and alarm systems used to ensure antenna structure lighting systems are functioning properly. (The rules also require structure owners to either make a once-a-day inspection to ensure lights are functioning properly, observe an automatic properly-maintained indicator at least once every twenty-four hours, or deploy an automatic alarm system designed to detect lighting failures and notify the owners of any failures.) Specifically, systems with advanced self-diagnostic functions (such as alarm notification, 24-hour polling, and manual contact), an operations center staffed with trained personnel capable of responding to alarms 24 hours per day, 365 days per year, and a backup Operations Center that can monitor systems in the event of catastrophic failure may be eligible for the exemption. Otherwise, the quarterly inspection requirement applies, and antenna structure owners are not required to implement advanced monitoring capability.

The exemption procedure will affect:

(1) Antenna structure owners who were previously granted waivers for their antenna structures monitored by qualifying systems prior to the *Report and Order* are exempt from all inspection obligations for those structures, provided they continue to meet the qualifying monitoring obligations to which they have already certified.

(2) Structure owners who employ systems previously approved with respect to other owners but have not yet sought approval from the Commission may also certify that they are eligible for an exemption from the inspection obligations with respect to any antenna structure utilizing a NOC-based system; the FCC will modify its ASR system to allow structure owners to demonstrate that they are eligible for an exemption through a certification and supporting documentation demonstrating *both* that they use a previously approved advanced monitoring system *and* that their antenna structures are monitored under the same process described in the order granting a waiver for that system. In addition, they must maintain a facility to receive notifications of failures from the advanced monitoring system, enabling them to carry out their responsibilities under Part 17 of our rules.

(3) Structure owners who employ systems for which no antenna structure owner has been granted waiver relief by the Commission may continue to petition Wireline Telecommunications Bureau for a waiver from the quarterly inspection requirements; the Bureau will continue to evaluate petitions for exemption of any new NOC-based systems using the same process it used in granting previous waiver requests.

The *Report and Order* emphasizes that the lighting required under an ASR must remain on or, if required lights become extinguished, the structure owner must promptly request a Notice to Airmen (“NOTAM”) on which pilots rely to help ensure air safety, and that the exemption from quarterly inspections is *not* an exemption from obligations to comply with these requirements or protection from enforcement actions related to them.

- **Notifications of Outages or Improper Functioning of Lights**

The FCC harmonized its rules regarding notifications of lighting outages with FAA requirements. The rules already require that structure owners promptly report outages of top steady burning lights or flashing antenna structure lights to the FAA, which upon receipt of the notice will issue a NOTAM, which is cancelled after 15 days. If a lighting outage cannot be repaired within the FAA’s original NOTAM period, the FCC will require the structure owner to notify the FAA and provide an estimated return-to-service date. Structure owners will also be required to provide any needed updates to its estimated return-to-service date to the FAA and continue to provide such updates to the FAA every NOTAM period until the lights in question are repaired. The Commission intends that a NOTAM be reissued after the expiration of every NOTAM period so long as any outage continues.

- **Lighting Repair Timelines**

The *Report and Order* addressed an inconsistency in the current Part 17 rules and adopted a single standard for the repair of antenna structure lighting, automatic indicators, automatic control systems, and alarm systems, requiring that they be made “as soon as practicable.” The FCC envisions that this will provide structure owners with flexibility to fulfill their obligation to complete repairs to lighting system malfunctions in a timely fashion. In determining whether the “as soon as

practicable” standard has been met, the Commission emphasized in the *Report and Order* that it may consider whether the owner has exercised due diligence and has made good faith efforts to complete repairs. In the *Report and Order*, the FCC declined to impose specific, fixed timeframes for replacing or repairing extinguished lights or to require a second lighting system for antenna structures in very remote locations.

- **Recordkeeping Requirements**

The Commission revised its rules to require antenna structure owners to maintain records of observed or otherwise known outages or improper functioning of structure lights for two years. The current rules do not specify how long records have to be kept. Structure owners will also be required to provide such records to the Commission upon request.

- **Maintaining Marking of Antenna Structures**

The *Report and Order* adopted the FAA’s “In-Service Aviation Orange Tolerance Chart” (“Chart”) as the FCC’s benchmark for determining whether an antenna structure needs to be cleaned or repainted, providing structure owners for the first time with a generally applicable measurement tool to aid them in deciding when to clean or repaint under the current standard that they do so “as often as necessary to maintain good visibility.” The FCC will require structure owners, consistent with FAA guidelines, to use the Chart to sample colors on the upper half of the structure to determine when painting is necessary. The Commission chose to not require repainting after a fixed interval, say every ten years, or to prescribe a set distance from which the Chart is to be compared with the top half of the structure. The *Report and Order* commented that placing the Chart directly over the surface of a portion of the top half of the structure would provide the best results, but recognized this may not be practical due to weather or access limitations.

3. Changes to Definition of “Antenna Structure” and Other Modifications

In the *Report and Order*, the FCC also chose to clarify some of the definitions for terms used in Part 17. “Antenna Structure Owner” was updated to include the owner of the underlying structure that supports antennas rather than limited to the antenna owner. (The Commission clarified, however, that “antenna structure owner” does *not* apply to owners of structures, such as bridges or buildings that might support antennas.) Similarly, “antenna structure” was also updated to include the underlying structure – *i.e.*, “a structure that is constructed or used to transmit radio energy, or that is constructed or used for the primary purpose of supporting antennas to transmit and/or receive radio energy, and any antennas and other appurtenances mounted thereon.” These changes clarify that the FCC’s Part 17 rules apply to actual owners of the structure and *not a tenant leasing space for an antenna on the structure*. Additionally, an antenna structure will now be considered to exist from the start of construction through to dismantlement, regardless of whether it ceases or begins to transmit radio energy. Finally, the owner’s Part 17 responsibilities do not cease until the structure is dismantled.

The FCC declined to exempt Distributed Antenna Systems (“DAS”) and small cells (read generally) from the Part 17 requirements. The *Report and Order* noted that DAS and small cell antenna deployments, which can be deployed on utility poles, street lamps, water towers, rooftops, or inside buildings, could, in certain situations, trigger the requirement to notify the FAA and/or to seek an

ASR from the FCC.

Finally, the Commission declined in the *Report and Order* to delete the criteria in Part 17 for when notification to the FAA is required and, instead, to cross-reference FAA rules concerning notification. The FCC adopted rule modifications to clarify that antenna structures must be registered only when notice to the FAA is currently required due to physical obstruction. The Commission refused to cross-reference the FAA rules to prevent future FAA rulemakings from expanding the scope of its rules automatically, but did delegate authority to the Wireless Telecommunications Bureau to update the rules, after an opportunity for notice and comment, to comport with future FAA rule changes regarding when constructions or alternations require FAA notification.

If you have any questions regarding this client advisory, Part 17 compliance, or interpretation of FAA Advisory Circulars, please contact [Chip Yorkgitis](#) or your usual Kelley Drye attorney in our [Communications Practice Group](#).