

KEØOG Band Charts for Ask Dave #29

| Parameter | 160 | 80 | 60 | 40 |
|---|--|--|---|--|
| Antenna size | Unwieldy, must put up high, often need separate receiving antenna | Unwieldy, hard to get high, need separate antennas for each end of band | Manageable, often used for NVIS, so lower antenna okay. | Manageable, but half wavelength is 60 feet. Usually single dipole can cover entire band. Full-size verticals common but can |
| Propagation characteristics | Usually a winter band. Very noisy in summer from QRN. Daytime use severely hampered by D-layer absorption. Is viewed as serious DX band. | Often a winter, night-time band, but both ground wave and NVIS can cover several hundred miles even with daytime D layer absorption. | Propagation characteristics between 80 and 40 meters | Less D-layer absorption and can cover distances of at least 200 miles more easily in daytime. Stays open much of evening and opens in early morning. DX during grayline. |
| Novice and Tech privileges | No | Yes, CW only | No | Yes, CW only |
| Power limitations less than 1.5 KW PEP? | No | No | Yes, 100 W EIRP | No |
| General Class privileges | Entire band | Upper 200 kHz | Entire band | Upper 125 kHz |
| Open for contesting? | Yes | Yes | No | Yes |
| Sideband used | LSB | LSB | USB | LSB |
| FM? | No | No | No | No |
| Digital modes? | Not so popular | Sometimes used | Rare | Common, especially evening |

KEØOG Band Charts for Ask Dave #29

| Parameter | 30 | 20 | 17 | 15 |
|---|---|---|--|---|
| Antenna size | Easier, half wave in air is 45 feet, single dipole covers entire band | Easy dipole. Increased gain from yagi, quad, etc. Tribanders always include this band. Always included in multi-band verticals. | Smaller still. Dipole or vertical just fine. Often found in multi-band verticals. Five band yagis will include this band | Can use a 40m dipole with a tuner, or construct 15 m dipole. All tribander yagis include this band. Note: the band is wide, antenna |
| Propagation characteristics | Better long distance propagation, open early morn, daytime, and into evening. | Strong propagation during daytime and often into evening. DX band. When band conditions are good, open worldwide. Try grayline. | Tends to be a daylight band. Can go very long at times, also during grayline. Good DX band. Not usually open at night. | Tends to be a daylight band. Can go very long at times, also during grayline. Good DX band. Not usually open at night. |
| Novice and Tech privileges | No | No | No | Yes, CW only |
| Power limitations less than 1.5 KW PEP? | Yes, 200 W PEP | No | No | No |
| General Class privileges | Entire band | Upper 175 kHz | Entire band | Upper 175 kHz |
| Open for contesting? | No | Yes | No | Yes |
| Sideband used | n/a (code only) | USB | USB | USB |
| FM? | No | No | No | No |
| Digital modes? | Relatively common | Very common, many modes, esp PSK-31 and JT65, also RTTY | From time to time | Common when propagation permits |

KEØOG Band Charts for Ask Dave #29

| Parameter | 12 | 10 |
|---|--|--|
| Antenna size | Multiband verticals often include this band. Five band Yagis include this band. Easy to construct and erect a dipole | All tribander yagis include this band. Multiband verticals usually include this band. Dipole easy to construct and erect |
| Propagation characteristics | Tends to be a daylight band. Can go very long at times, also during grayline. Good DX band. Not usually open at night. | Tends to be a daylight band. Can go very long at times, also during grayline. Good DX band. Not usually open at night. When the band is open, very long distances can be reached with lower power and ordinary antennas. |
| Novice and Tech privileges | No | Yes, both CW and voice |
| Power limitations less than 1.5 KW PEP? | No | No |
| General Class privileges | Entire band | Entire band |
| Open for contesting? | No | Yes |
| Sideband used | USB | USB |
| FM? | No | Yes, above 29 MHz |
| Digital modes? | From time to time | Common when propagation permits |