# PARKING LOT PAVING GUIDE



A guide to help understand maintenance options, when to reconstruct your lot, and identifying structural issues.







#### PARKING LOT SCALE

New Parking Lot. Just constructed.

NO MAINTENANCI

- **2.** Surface cracks just starting to form.
- Thermal Cracking just starting to form.
- Thermal cracking throughout entire lot.
  SEAL COAT/ CRACK SEALING
- Deep thermal cracking, multiple surface cracks throughout entire lot.
- Deep thermal cracking, multiple surface cracks, small potholes and standing water.
- Deep thermal cracking, multiple surface cracks, large potholes and standing water.

  OVERLAY
- **8.** Alligator cracks starting- Penetration to subgrade.
- Severe alligator cracks, small potholes, deteriorated subgrade.
- Alligatored, missing sections, large potholes, falling through base, exposed gravel areas.

COMPLETE RECONSTRUCTION

New Parking Lot. On the scale, a rating of one means your parking lot is brand new and in top condition!



Surface appearance

About two to three years after initial construction, all pavement tends to start surface cracking (microcracking). If small surface cracking appears, your lot may require a seal coat to increase it's life-span. A sealcoat is an application of oil on top of the paved surface. Seal coating allows for the asphalt to be more protected and help prevent water from entering microcracks.



Surface appearance

3.

About three to five years after initial construction, all pavement tends to form thermal cracking. Typically this cracking forms at jointed sections within the pavement. These thermal cracks can tend to grow bigger due to the freeze thaw cycles in the Midwest. To avoid these from getting bigger your lot requires a crack seal.



Surface appearance



4.

After eight to ten years parking lots tend to develop deeper thermal cracking and expansion of surface cracking if not properly maintained. If the lot has deeper thermal cracking or expanding surface cracking, a crack seal as well as a seal coat are recommended to protect your parking lots surface.

Surface appearance



About fifteen to twenty years after initial construction, further surface cracking has spread throughout entire lot. Thermal cracks are deep, open, and exposed. When lots reach this state, they require a mill and overlay or just an overlay. This process removes the top two inches of the existing asphalt and then is replaced with new asphalt.



Surface appearance



Around twenty to twenty five years after initial construction parking lots if not properly maintained will continue to present thermal cracking, surface cracking, and small potholes may form. Potholes collect water and allow water to stay trapped on and in the pavement causing the pavement to expand, contract, and ultimately loose structural integrity. Surface removal and basecourse patching may be required.

Surface appearance



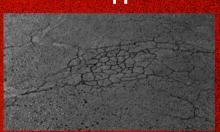


Around twenty five years after initial construction parking lots if not properly maintained will continue to surface crack intensely, form larger thermal cracks, light alligator cracking, and large potholes. Be sure to consult with Bowes Construction, most of the times parking lots in a category seven could get by with an overlay, however if potholes are too large reconstruction may be required.

Surface appearance



8.



Around thirty years after initial construction, if not properly maintained parking lots will start to form areas of alligator cracking. Alligator cracks look nearly like alligator skin and allow water to penetrate the gravel base underneath the parking lot. In most cases a complete reconstruction is required. In some instances removal of specific sections may be required to fix subgrade, and the rest of the lot may be overlaid.



Surface appearance



Around thirty five years after initial construction, if not properly maintained parking lots will start to form consistent alligator cracking throughout the parking lot. As well as formation of small potholes and large thermal cracking. A complete reconstruction is required for cases like these, including the addition of new base course.





10.



Around thirty five to forty years after initial construction, if not properly maintained parking lots will form consistent alligator cracking throughout the parking lot. As well as formation of large potholes where gravel can be seen and is surfacing. A complete reconstruction is required for cases like these, in addition to completely new base course for the entire lot.

Surface appearance



# WANTAN EXPERT OPINION??

**Bowes Construction is happy to help with any** pavement questions you may have! We offer free quotes to help you plan for your budget, as well as offer professional insight and knowledge about your parking lot. We are happy to help, in order to contact us call the number below or visit our website and select "Get a free Quote" which you can then message us for any other questions you may have. Still not enough? Message us over our social pages on Facebook, Instagram, TikTok, or YouTube @bowesconstruction.



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