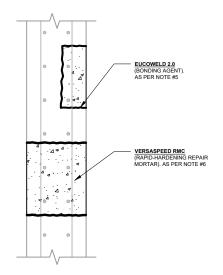


# EXISTING CONDITION

# CONCRETE REMOVAL AND SURFACE PREPARATION



COMPLETED REPAIR

Drawn by: AMH



# **GENERAL CONCRETE REPAIR NOTES**

### 1. CONCRETE REMOVAL:

EXCEPT WHERE NOTED OTHERWISE, PERFORM CONCRETE REMOVAL IN ACCORDANCE WITH RECOMMENDATIONS OF ICRI GUIDELINE 310.1R "GUIDE FOR SURFACE PREPARATION FOR THE REPAIR OF DETERIORATED CONCRETE RESULTING FROM REINFORCING STEEL CORROSION."

PROVIDE MINIMUM IS INCH (12 MM) DEEP SAW CUT AT PERIMETER BOUNDARIES OF REPAIRS. MAKE SAW-CUT PERPENDICULAR TO CONCRETE SURFACE. SAW-CUT BOUNDARIES ARE TO BE STRAIGHT AND ALIGNED PARALLE TO OPPOSITE BOUNDARY EDGES. REPAIR CONFIGURATIONS SHOULD BE KEPT SIMPLE, PREFERBALY RECTANGULAR, MINIMIZE REENTEANT CORNERS TO PREVENT CRACKING, DO NOT ALLOW SAW TO COME INTO CONTACT WITH REINFORCING STEEL REPAIR AREA CONFIGURATION EXAMPLE:







VISTING DETERIORATION

RECTANGULAR BOUNDARIES

REENTRANT CORNERS NOT RECOMMENDED

REMOVE ALL CONCRETE WITHIN REPAIR BOUNDARY TO A UNIFORM DEPTH. MINIMUM DEPTH IS AS REQUIRED BY REPAIR PRODUCT LIMITATIONS, AND AS REQUIRED TO PROVIDE MINIMUM REQUIRED CLEARANCE AROUND EXPOSED REINFORCING STEEL AND EMBEDDED GALVANIC ANODES WHEN SPECIFIED. CONTINUE REMOVAL UNTIL ALL UNSOUND, DELAMINATED, AND CRACKED CONCRETE HAS BEEN REMOVED.

WHERE 19 OR MORE OF REINFORCING STEEL'S PERIMETER IS EXPOSED EITHER BY EXISTING CONDITIONS OR CONCRETE REMOVAL PROCEDURES, BOND BETWEEN CONCRETE AND REINFORCING STEEL IS BROKEN, OR CORROSION IS PRESENT, TEMDVE CONCRETE AS REQUIRED TO PROVIDE MINIMIM \$1 NICH (19 MM), CLEARANCE ARQUIND ENTIRE PERIMETER OF STEEL OR MINIMUM \$1/LCH 6 MM). LARGER THAN COARSE AGGREGATE IN REPAIR NATERIAL, WHICH EVER IS GREATEST, REMOVE CONCRETE ALONG ENTIRE PERIMETER OF STEEL OR MINIMUM \$1/LCH 6 MM]. LARGER THAN COARSE AGGREGATE IN REPAIR NATERIAL, WHICH EVER IS GREATEST, REMOVE CONCRETE ALONG ENTIRE EXPENDED CONCRETE AGROWAL DEUNDARIES TO BEVOND CORROSION ON REINFORCING BARS.

AFTER CONCRETE REMOVAL HAS BEEN COMPLETED, USE ABRASIVE BLASTING OR HIGH-PRESSURE WATER BLASTING WITH OR WITHOUT ABRASIVE TO REMOVE ANY BRUISED CONCRETE SUBSTRATE WEAKENED BY MICROCRACKING.

CONTACT THE ENGINEER BEFORE REMOVING CONCRETE IN COLUMNS.

#### 2. CONCRETE PREPARATION AND CLEANING:

AREAS TO RECEIVE CONCRETE REPAIR ARE TO BE STRUCTURALLY SOUND AND FREE OF LOOSE OR DETERIORATED CONCRETE, DUST, DIRT, PAINT, SEALERS, OIL, FEFLORESCENCE, LATRANCE, AND OTHER CONTAMINANTS THAT COULD INTERFERE WITH BOOM. MECHANICALS PRABED SUBFACE TO PROVIDE MINIMUM CONCRETE SUBFACE PROFILE (CSP) EQUAL TO THAT RECOMMENDED BY REPAIR MORTRA MANUFACTURER AND IN ACCORDANCE WITH RECOMMENDATIONS OF ICRI GUIDELINE 310.2R "SELECTING AND SPECIFYING CONCRETE SUBFACE PREPAIR."

#### 3. PREPARING REINFORCING STEEL:

CLEAN AND PREPARE EXPOSED REINFORCING STEEL IN ACCORDANCE WITH RECOMMENDATIONS OF ICRI GUIDELINE 310.1R "GUIDE FOR SURFACE PREPARATION FOR THE REPAIR OF DETERIORATED CONCRETE RESULTING FROM STEEL CORROSION." TO ENSURE A CLEAN SURFACE FOR ADEQUATE BOND WITH THE REPAIR MATERIAL, REMOVE CONCRETE FRAGMENTS, CORDOSION PRODUCTS, MILL SCALE, AND OTHER FOROM TENDED, FROM REINFORCING BARS USING ARRASIVE MEDID BLASTING (AMB) OR MECHANICAL CLEANING IN ACCORDANCE WITH ICRI 210.5R "GUIDE FOR SURFACE PREPARATION FOR THE REPAIR OF DETERIORATED CONCRETE RESULTING FROM REPROFICIORS STEFL CORROSION"

IF REINFORCING STEEL HAS LOST CROSS-SECTIONAL AREA, CONTACT THE ENGINEER BEFORE PROCEEDING.

ENSURE MINIMUM COVER OVER REINFORCING STEEL IN ACCORDANCE WITH ACI 562 "CODE REQUIREMENTS FOR ASSESSMENT, REPAIR, AND REHABILITATION OF EXISTING CONCRETE STRUCTURES." IF MINIMUM COVER CANNOT BE ACHIEVED, CONTACT THE ENGINEER.

REPAIR DAMAGE TO EPOXY-COATED REINFORCEMENT IN ACCORDANCE WITH ASTM D3963 "STANDARD SPECIFICATION FOR EPOXY-COATED REINFORCING STEEL BARS."

### 4. CORROSION INHIBITING COATING:

5/20/2025

MIX EUCLID CHEMICAL DURALPREP A.C. CORROSION-INHIBITING COATING AND APPLY TWO 20 MIL (0.51 MM) COATS TO DRY, PROPERLY PREPARED, STEEL SURFACES IN ACCORDANCE WITH MANUFACTURERS PUBLISHED RECOMMENDATIONS AND LIMITATIONS.

## 5. BONDING AGENT:

APPLY EUCLID CHEMICAL EUCOWELD 2.0 BONDING AGENT TO PROPERLY PREPARED SUBSTRATE IN ACCORDANCE WITH MANUFACTURER'S PUBLISHED RECOMMENDATIONS AND LIMITATIONS, PROVIDE COMPLETE AND THROUGH COVERAGE ENSURING THAT BONDING AGENT HAS BEEN FULLY WORKED INTO SUBFACE. ALTERNATIVE BONDING METHODSMATERIALS PERMITTED IF RECOMMENDED BY REPAIR MORTRA MANUFACTURER AND APPROVED BY TROINEER.

#### 6. REPAIR MORTAR:

MIX AND APPLY REPAIR MORTAR IN ACCORDANCE WITH MANUFACTURERS PUBLISHED RECOMMENDATIONS AND LIMITATIONS, AND WITHIN OPEN TIME OF ANY PRODUCT SCRUB COATS OR BONDING AGENTS.

FULLY CONSOLIDATE REPAIR MORTAR AS REQUIRED TO ENCAPSULATE REINFORCEMENT, FILL ALL VOIDS, AND AVOID HONEYCOMBING. FINISH TO MATCH SURROUNDING SURFACE.

# 7. CURING:

IMMEDIATELY FOLLOWING PLACEMENT AND FINISHING PROCEDURES CURE CEMENTITIOUS REPAIR MORTARS IN ACCORDANCE WITH MANUFACTURERS PUBLISHED RECOMMENDATIONS AND LIMITATIONS.

<b>EUCLID</b>	CHEMICAL

# **EUCLID CHEMICAL CONCRETE RESTORATION SYSTEMS**

Detail: VERSASPEED RMC - VERTICAL CONCRETE REPAIR

Checked by: BDG

File Name:

CR-19

Note: These paragraphs and details are meant to be incorporated into a project's general structural notes or directly onto the plans. They must be carefully reviewed by a qualified design professional and edited to meet the particular requirements of the project at hand, assure compliance with any governing building codes, and coordinate with other specification sections and drawings. In no case shall these guide specifications be considered to be contract documents or serve as installation instructions for the product being discussed, in any cases of discrepancy, the manufacturer's most recently published data sheet shall take precedence.

19215 Redwood Road Cleveland, OH 44110

800-321-7628

Scale: NTS