



NUMBER 13-13-00194-CV

COURT OF APPEALS

THIRTEENTH DISTRICT OF TEXAS

CORPUS CHRISTI - EDINBURG

USA WALNUT CREEK, DST,

Appellant,

v.

**TERRACON CONSULTANTS, INC.
F/K/A HBC ENGINEERING, INC.,**

Appellee.

**On appeal from the 261st District Court
of Travis County, Texas.**

MEMORANDUM OPINION

**Before Chief Justice Valdez and Justices Rodriguez and Benavides
Memorandum Opinion by Chief Justice Valdez**

Appellant, USA Walnut Creek, DST, sued various defendants, including appellee, Terracon Consultants, Inc., f/k/a HBC Engineering, Inc., for negligence in the construction of appellant's apartment complex.¹ By one issue, appellant contends that the trial court

¹ This case is before the Court on transfer from the Third Court of Appeals in Austin pursuant to an order issued by the Supreme Court of Texas. See TEX. GOV'T CODE ANN. § 73.001 (West, Westlaw through 2013 3d C.S.).

should not have granted Terracon's no-evidence summary judgment because it offered more than a scintilla of evidence showing that Terracon, an engineering subcontractor, breached a tort duty owed to it, which caused damages. We reverse and remand.

I. BACKGROUND

Creekstone Walnut, LP ("Creekstone") contracted with its affiliated entity, Creekstone Builders, Inc. ("Builders"), who subcontracted Terracon to perform, "(a) geotechnical engineering; and (b) materials-inspection and testing services for the Project under two contracts,"² which include "The Engineering Services Contract" and "The Inspection and Testing Contract." Appellant was not a party to these contracts. According to appellant, under the Engineering Services Contract, Terracon would provide Creekstone Builders "with a Field Program of drilled test borings, Laboratory Testing meeting specific project requirement to observe and identify subsurface conditions, and an Engineering Report (the Soils Report)," which "provided geotechnical-engineering recommendations for site and subgrade preparation, foundation design and construction, and pavement design guidelines for the Project." In its brief, appellant explains that under the Inspection and Testing Contract, Terracon provided "construction materials inspection-and-testing services for the Project, including an estimated 475 compaction tests on earthwork, per ASTM F2922 and ASTM D3017, all in accordance with the Plans and the City of Austin's Special Inspection Requirements."

The apartment complex was completed in 2002. In March, 2005, appellant purchased the apartment complex from Creekstone.³ In 2007 and 2008, reports made

² The parties refer to the construction of the apartment complex as "the Project."

³ The apartment complex consists of twelve residential buildings totaling 284 units, located on approximately fourteen acres in Austin, Texas.

by Terracon showed that damage had occurred in many of the buildings of the apartment complex.⁴

Appellant sued several defendants (the “Creekstone Defendants”), who are not parties in this appeal on March 6, 2009 alleging it had sustained damages as a result of their conduct.⁵ Appellant alleged that the Creekstone Defendants had caused appellant damages by defective construction and maintenance of the apartment complex.

In June 2012, the Creekstone Defendants filed a motion for leave to designate responsible third parties, including Terracon, alleging that Terracon’s conduct caused or contributed to appellant’s damages. Terracon was designated a responsible third party, and appellant filed its second amended petition on June 30, 2011 adding Terracon as a defendant alleging that Terracon was negligent and proximately caused its damages.⁶

On November 5, 2012, Terracon filed its no-evidence motion for summary judgment alleging that there was no evidence to support appellant’s claim “that Terracon

⁴ Terracon reported the existences of “drywall cracks, tape joint separations, misaligned doors, floor slopes, etc.” inside Building 12. Terracon noted “drywall crack[s],” “noticeable floor slope,” “caulk joint separation,” and “[l]arge separation at stairway connection.” Another engineer with Hold Engineering, Inc., Steven B. Johnson, observed substantial cracking and significant drywall cracking floor-sloping conditions, and moderate to large structural movement, including un-level floors, cracks in drywall, out-of-plumb door jambs, and movement in the stairways in the outside corridor in Buildings 6, 9, 11, and 12. Kirby Meyer of MLAW Consulting Engineers, also performed an investigation and determined, among other things, that: (1) “all surveyed buildings except for Building 3 (the clubhouse building) had significant evidence of foundation movement”; (2) “all buildings except for Building[s] 3 and 4] had foundation tilt or distortion ratios that exceeded commonly accepted criteria for foundation performance”; (3) “the Buildings at the property have incurred physical property damage, including damage that has occurred and increased between 2007 through 2011, resulting from Terracon’s errors and omissions”; and (4) “all buildings except Building 3 were in a failure mode based on performance and concluded that there exists unacceptable foundation performance of all Buildings at the Project.” Finally, Dean Read with MLAW investigated and analyzed the defective construction at the Project and prepared a reasonable and necessary plan of repair to remedy the foundation and structural problems.

⁵ The defendants included, Creekstone, Creekstone Capital Apartments, LLC, Builders, Creekstone Partners, LLC, and Creekstone Management, LLC.

⁶ Terracon points out that appellant alleges that it committed its negligence in “2000–2002” and that appellant did not exist when the alleged negligence occurred. Terracon states, “[Appellant] offered no evidence of its existence as an entity during the time of construction (or prior to the purchase), or involvement with construction in response to Terracon’s motion” for no-evidence summary judgment.

(a professional services subcontractor to the Creekstone Defendants during construction) owed a tort duty to [appellant] as a result of the performance of professional services related to the construction project.” Appellant responded to the motion that Terracon owed it “a tort duty to exercise ordinary care not to injure [appellant’s] property” because pursuant to Texas common law, Terracon owed a tort duty to subsequent owners.⁷

The trial court held a hearing on Terracon’s motion on December 17, 2012 and granted it on December 18, 2012. This appeal followed.

II. STANDARD OF REVIEW

A party may move for summary judgment on the ground that no evidence exists of one or more essential elements of a claim on which the adverse party bears the burden of proof at trial. TEX. R. CIV. P. 166a(i); *Timpte Inds., Inc. v. Gish*, 286 S.W.3d 306, 310 (Tex. 2009). Once the motion is filed, the burden shifts to the nonmovant to produce evidence raising a genuine issue of material fact on the elements specified in the motion. TEX. R. CIV. P. 166a(i); *Mack Trucks, Inc. v. Tamez*, 206 S.W.3d 572, 582 (Tex. 2006). If the respondent brings forth more than a scintilla of probative evidence to raise a genuine issue of material fact, summary judgment is improper. *King Ranch, Inc. v. Chapman*, 118 S.W.3d 742, 751 (Tex. 2003). More than a scintilla of evidence exists when the evidence “rises to a level that would enable reasonable and fair-minded people to differ in their conclusions,” while less than a scintilla exists when the evidence is “so weak as to do no more than create mere surmise or suspicion.” *Id.*; *Reynosa v. Huff*, 21 S.W.3d 510, 512 (Tex. App.—San Antonio 2000, no pet.). “When reviewing a no-evidence summary judgment, we ‘review the evidence presented by the motion and response in the light

⁷ Terracon states in its brief that appellant did not cite to the trial court any Texas authority recognizing that an engineering subcontractor owed a tort duty to a subsequent property owner that neither existed nor owned the property at the time of the alleged negligence.

most favorable to the party against whom the summary judgment was rendered, crediting evidence favorable to that party if reasonable jurors could, and disregarding contrary evidence unless reasonable jurors could not.” *Timpte Inds., Inc.*, 286 S.W.3d at 310.

In *Means v. ABCABCO, Inc.*, the Austin Court of Appeals held that a purely legal question can be presented in a motion for no-evidence summary judgment, and that the proper standard of review is de novo.⁸ 315 S.W.3d 209, 214 (Tex. App.—Austin 2010, no pet.). Whether Terracon owed appellant a duty is a question of law. See *Allen Keller Co. v. Foreman*, 343 S.W.3d 420, 425 (Tex. 2011). Therefore, Terracon could have properly challenged whether a duty exists in its motion for no-evidence summary judgment, and we must apply a de novo standard of review to the issue of duty. See *Means*, 315 S.W.3d at 214. If no duty exists as a matter of law on a basis challenged by Terracon, then appellant could not have prevailed. See *id.*

If any of the grounds presented in a motion for summary judgment are meritorious even when the trial court grants the judgment without specifying the grounds, we will affirm the summary judgment. *FM Props. Operating Co. v. City of Austin*, 22 S.W.3d 868, 872–73 (Tex. 2000). However, we may not affirm on the basis of grounds that are not pled in the summary judgment motion. *Johnson v. Brewer & Pritchard, P.C.*, 73 S.W.3d 193, 204 (Tex. 2002). A motion for summary judgment must itself expressly present the grounds upon which it is made, and must stand or fall on these grounds alone. *Sci. Spectrum v. Martinez*, 941 S.W.2d 910, 912 (Tex. 1997) (citing *McConnell v. Southside Indep. Sch. Dist.*, 858 S.W.2d 337, 341 (Tex. 1993)); see TEX. R. CIV. P. 166a(c) (“The

⁸ This Court stated in *Franks v. Roades* that whether a party owes another a duty is a question of law that is “inappropriate for a no-evidence summary judgment.” 310 S.W.3d 615, 621 (Tex. App.—Corpus Christi 2010, no pet.). However, as this is a transfer case, we are bound by the Texas Rules of Appellate Procedure to follow the Austin Court of Appeal’s precedent. See TEX. R. APP. P. 41.3. Thus, to the extent there may be a conflict with our Court’s precedent, we will follow the Austin Court’s authority. See *id.*

motion for summary judgment shall state the specific grounds therefor.”). Moreover, an appellate court may not rely on briefs or summary judgment evidence in order to affirm a summary judgment. *McConnell*, 858 S.W.2d at 341.

III. DUTY

A. Applicable Law

Under what is known as the economic loss rule, parties to a contract may be barred from recovering purely economic losses in a negligence claim.⁹ *Sharyland Water Supply Corp. v. City of Alton*, 354 S.W.3d 407, 415 (Tex. 2011) (citing *Equistar Chems., L.P. v. Dresser–Rand Co.*, 240 S.W.3d 864, 867 (Tex. 2007); *Jim Walter Homes, Inc. v. Reed*, 711 S.W.2d 617, 618 (Tex. 1986)). In certain circumstances, “[t]he contractual relationship of the parties may create duties under both contract and tort law” and “the party may breach duties in tort or contract alone or simultaneously in both.” *Jim Walter Homes, Inc.*, 711 S.W.2d at 618. In addition to this contractual duty, a common law duty also exists to use reasonable care in performing the terms of the contract without injuring property that belongs to non-contracting parties. *Chapman Custom Homes, Inc. v. Dallas Plumbing Co.*, 445 S.W.3d 716, 717 (Tex. 2014).

In *Chapman Custom Homes*, the court of appeals held that a homeowner did not have a negligence claim because the homeowner “did not allege violation of any [tort duty] independent of the contract” and “did not have a contract claim because [the homeowner] was not a party to the plumbing subcontract.” *Id.* (internal quotations omitted). In overruling the court of appeal’s judgment, the Texas Supreme Court

⁹ “The most general statement of the economic loss rule is that a person who suffers only pecuniary loss through the failure of another person to exercise reasonable care has no tort cause of action against that person. Because the rule applies to a diverse range of situations, there is not one economic loss rule, but several.” *Sharyland Water Supply Corp. v. City of Alton*, 354 S.W.3d 407, 415 (Tex. 2011) (citing and quoting Jay M. Feinman, *The Economic Loss Rule and Private Ordering*, 48 ARIZ. L. REV. 813, 813 (2006)).

reasoned that “[h]aving undertaken to install a plumbing system in the house, the plumber assumed an implied duty not to flood or otherwise damage the [homeowner’s] house while performing its contract with the builder [of the home].” *Id.* at 718. The court stated, “[A] party cannot avoid tort liability to the world simply by entering into a contract with one party [otherwise] the economic loss rule [would] swallow all claims between contractual and commercial strangers.” *Id.*

In *Sharyland Water Supply Corp.*, the Texas Supreme Court explained that it has applied the economic loss rule only in cases which have involved defective products or failure to perform a contract and had applied the rule even to cases wherein no privity of contract existed for example in cases concerning a remote manufacturer and a consumer. 354 S.W.3d at 418. In that case, Sharyland Water Supply Corp. (the “water company”) sued the City of Alton (the “City”) for negligence because the City’s contractors had allegedly failed to install a sanitary sewer system consisting of main sewer lines in accordance with the applicable state regulations. *Id.* at 410. The water company claimed those sewer lines threatened to contaminate the water company’s potable water supply. *Id.* The court of appeals held that the economic loss rule barred the water company’s negligence claim against the contractors although it was a non-party to the contract. *Id.* at 411. The *Sharyland* court reversed the lower court’s judgment holding that the water company’s negligence claim was not barred by the economic loss rule. *Id.* at 420. The supreme court said that it had “never held that [the economic loss rule] precludes recovery completely between contractual strangers in a case not involving a defective product—as the court of appeals did here.” *Id.* at 418. The court reasoned that “[m]erely because the sewer was the subject of a contract does not mean that a contractual stranger is necessarily barred from suing a contracting party for breach of an independent duty.” *Id.* at 419. The court ended its analysis by stating, “The [economic loss] rule cannot apply

to parties without even remote contractual privity, merely because one of those parties had a construction contract with a third party, and when the contracting party causes a loss unrelated to its contract.” *Id.* at 420. The contractors did not argue that they did not owe a legal duty to the water company. See *City of Alton v. Sharyland Water Supply Corp.*, 277 S.W.3d 132, 147 (Tex. App.—Corpus Christi 2009), *rev’d in part on other grounds*, 354 S.W.3d at 424.

B. THE SUMMARY JUDGMENT ARGUMENTS

In its summary judgment Terracon stated that “a contract can be the basis for imposing a duty recognized in tort” and that “there is a common law duty to perform [the contract] with the care, skill, reasonable expedience, and faithfulness.” Terracon explained that “[a] party is under a duty to act with reasonable skill and diligence in performing the contract so as not to injure a person or property by its performance”; however, “[a] duty created by contract does not inure to the benefit of the public at large.” Citing *Black + Vernooy Architects v. Smith*, 346 S.W.3d 877, 885 (Tex. App.—Austin 2011, pet. denied), Terracon stated that “a contract to provide professional services in connection with a construction project does not create a duty owed to every ‘foreseeable user’ of the finished project.” *Id.* Relying on *Vernooy*, Terracon argued that it owed no contractual or common law duty to appellant because, as in *Vernooy*, it “had no right to control the construction in this case and in fact, the construction was controlled by the Creekstone Defendants who were both general contractor and owner.” Thus, the basis for Terracon’s no-evidence motion for summary judgment was that it did not owe a duty to appellant because Terracon did not have the right to control the construction of the project. However, in its motion for summary judgment, Terracon did not argue that it did not owe a duty to appellant due to appellant’s status as a subsequent owner, an argument

it makes on appeal. Thus, the trial court could not have granted summary judgment on that basis. See *Sci. Spectrum*, 941 S.W.2d at 912; see also TEX. R. CIV. P. 166a(c).

Appellant responded to Terracon's summary judgment motion arguing that Terracon owed an independent tort duty to use reasonable care to not injure anyone's property even though Terracon was not contractual obligated to appellant. Appellant further argued that *Vernooy* is inapplicable to the facts of this case because here, the "lawsuit is a design case; it is against the foundation-design engineers (not architects)" and evidence exists showing that Terracon "did create the construction defect" and that it "acted in a negligent fashion in violation of its duty not to cause physical property damage to property belonging to third parties." Appellant attached evidence to its response showing that Terracon had performed numerous acts related to the construction of the foundation and that damage had occurred to multiple buildings on the complex allegedly due to Terracon's acts and/or omissions. See *Timpte Inds., Inc.*, 286 S.W.3d at 310 (providing that we must view the evidence in the light most favorable to the nonmovant). Thus, Terracon's no-evidence summary judgment fails if we conclude that as a matter of law *Vernooy* is inapplicable to the facts of this case and that appellant did not have to show that Terracon controlled the construction of the buildings.

C. Discussion

In *Vernooy*, homeowners contracted with the defendant architects to design a vacation home with a balcony. *Vernooy*, 346 S.W.3d at 879. During construction, the builder contractor and subcontractor deviated from the architects' design plans. *Id.* The balcony collapsed when the plaintiffs, who were visiting the homeowners, were standing on it. *Id.* The plaintiffs sued the architects alleging that the architects owed a duty to them to ensure that the builders followed the architects' design plans. *Id.* However, the *Vernooy* Court specifically stated that there had not been any "allegation that the

Architects negligently designed the balcony or that the Architects actually created the defects at issue.” *Id.* at 881. “To the contrary, [the plaintiffs] allege[d] that the defect was caused by the construction practices of the contractor and subcontractor when the balcony was not built in accordance with the design plans of the Architects.” *Id.* The *Vernooy* Court explained that a duty of reasonable care can either be imposed by law or assumed by contract. *Id.* at 882. The court concluded that the architects did not owe a common law duty to protect the plaintiffs from the acts of the third party builders and that the plaintiffs were not third-party beneficiaries of the contract between the homeowners and the architects. *Id.* at 892. Specifically, the court opined, “In the ‘absence of a relationship between the parties giving rise to the right of control, one person is under no legal duty to control the conduct of another, even if there exists the practical ability to do so.” *Id.* at 886.

As previously stated, the issue before the *Vernooy* Court did not include an allegation that the architects had negligently designed or created the defects which caused the balcony to collapse. Here, appellant alleges that Terracon negligently created the defects which are causing damage to its apartment complex. Appellant is not suing Terracon for failing to supervise the builders’ construction of the complex or failing to ensure that the builders followed the architects’ design plans. Appellant is suing Terracon for its own alleged negligent acts or omissions. Thus, we conclude that *Vernooy* is inapplicable to the facts in this case.

Relying on *Vernooy*, Terracon’s only basis for its motion for no-evidence summary judgment is that appellant did not provide any evidence that they had a duty because Terracon “had no right to control the construction in this case and in fact, the construction was controlled by the Creekstone Defendants who were both general contractor and owner.” However, as explained above, appellant is not suing Terracon for failing to

supervise a third-party builder as did the plaintiffs in *Vernooy*. Appellant is alleging that Terracon committed negligence in its performance of its duties under Terracon's contract with the Creekstone Defendants. So, whether Terracon controlled the construction of the buildings has no bearing on whether it negligently designed or created the defects which have damaged appellant's apartment complex because appellant is alleging that Terracon itself has committed a negligent act or omission. Thus, Terracon's only basis for its motion for summary judgment on the element of duty must fail. Accordingly, we sustain appellant's first issue.

IV. BREACH AND CAUSATION

As a sub-issue to its first issue, appellant contends that in response to Terracon's motion for no-evidence summary judgment, it provided evidence raising an issue of material fact regarding whether Terracon breached a duty and whether appellant suffered damages. Because we have concluded that summary judgment was improper on the element of duty, we must now determine whether Terracon's summary judgment prevails on its challenge to the elements of breach and causation.

In its live pleading, appellant alleged that Terracon was responsible for performing a geotechnical engineering study and "to provide construction-materials inspection and testing for the Walnut Creek Apartments" and that Terracon "owed a duty to perform each of the tasks under these agreements in a manner consistent with its agreements and in a manner consistent with that of a prudent and reasonable geotechnical engineer in the area under the same or similar circumstances." Appellant alleged that Terracon negligently (1) "failed to conduct and include the necessary testing and test data for analyzing and designing the parameters for the slab-on-grade foundations," (2) "failed to perform the necessary analysis, evaluation and design for the potential differential movement of the slab-on-grade foundation considering the non-homogenous soil profile

that existed at the site,” (3) “failed to analyze, evaluate, and design for the extreme variation in soil moisture found to exist at the site relative to potential for shrink/swell conditions,” (4) “recommended improper design parameters for the foundations and pavement,” and (5) “failed to perform its earth work testing in accordance with the Plans, its Agreement, the Contract Documents, and/or the City of Austin’s Special Inspection Requirements, including the negligent failure to inspect and identify earthwork construction not performed in accordance with the Plans, all in breach and non-conformity with the standard of care for geotechnical engineering services at the time and place Terracon provided its services.” Appellant stated that “Terracon’s negligence goes beyond the subject of Terracon’s contract with Creekstone Builders . . . and resulted in physical damage in other parts of the apartment buildings, such as broken windows, cracking walls and siding, doors that do not align, damaged framing, standing water, structural shifting, and other physical damage.” Appellant claimed it “incurred substantial damages,” in excess of \$6,500,000, which included among other things, decreased property value, repair costs caused by the defective construction, investigatory costs, loss of rentals, and attorney’s fees.

To its response to Terracon’s motion for no-evidence summary judgment, appellant attached and cited the affidavit of its expert, Kirby Meyer. In his affidavit, Meyer stated that he was the “owner, director, chairman and senior consultant with MLAW Consultants and Engineers” and that “MLAW was retained to review the foundation designs, geotechnical procedures, site grading, construction and performance of the buildings composing” appellant’s apartment complex.” Meyer stated, “I have personal knowledge of the accepted Standards of Care and Practice of structural, geostructural and geotechnical engineering such as exhibited by the HBC/Terracon report [the (“Terracon Report”)] for this project.” According to Meyer, after performing numerous

tests, he determined that the Terracon report required for Terracon to utilize “design parameters for slab-on[-]grade designs that were based on criteria published by the Post-Tensioning Institute (PTI) 2nd Edition Manual, which was published in 1996” and that the “Terracon report did not include vital testing data to properly utilize the referenced PTI manual,” meaning that Terracon would have had to have guessed some values to use in their analysis. Meyer concluded that “Terracon did not perform the site investigation and geotechnical engineering study in accordance with the Standard of Care prevalent at the time of the investigation in the Central Texas area” and that “[t]he PTI manual, which was invoked in [Terracon’s] report, clearly states the limitations of the table analysis method contained therein for calculating the amount of shrink or swell movement and provides recommendations for alternate procedures for sites with non-uniform soil profiles such as existed at this site.”

According to Meyer, “[Terracon] did not follow this recommendation” and that failure “to properly observe, test and monitor the select fill pad placements to conform to the recommendations in the [Terracon] report resulted in improper construction of the foundation systems and violated the Standard of Care for a testing laboratory.” In a second affidavit attached to appellant’s response to Terracon’s no-evidence motion for summary judgment, Meyer stated that since his first affidavit he had continued an investigation in this case dealing with the issues of foundation designs, geotechnical procedures, site grading, construction, and performance of the buildings and pavement composing the Reserve at Walnut Creek apartment complex (the Project),” which resulted “in the preparation of a Report authored by [Meyer] and Dean R. Read, P.E., entitled ‘Investigation of Foundation and Site Conditions, The Reserve at Walnut Creek Apartments, 8038 Exchange Drive, Austin, Texas 78754, dated August, 2011.’” Meyer explained that the August 2011 report contained

a description of his work and observations, findings, discussion, and opinions in this case with respect to, without limitation: (a) [Terracon's] failure to meet the standard of care prevalent at the time in the Central Texas area, for professional engineering with respect to Terracon's Site Investigation and Geotechnical Engineering Study (the Soils Report); (b) Terracon's failure to meet the standard of care for an engineering monitoring and testing firm with respect to its activities observing, testing and monitoring the select-fill pad placements at the Project so as to conform to the Soils Report, which standards were prevalent at the time in the Central Texas area; and, (c) that Terracon's failures caused improper construction of the foundations systems that resulted in physical property damage.

Meyer observed that Terracon's failures resulted in physical property damage to "the Buildings I," which he had noted in 2007 and "in additional physical damage continuing through 2011, upon [his] inspection for my August, 2011 Report." Meyer further opined that:

(a) all of the Post-Tension-Institute (PTI) soil support parameters in Terracon's October, 2000 Soils Report were inadequate to properly characterize the Project's site; (b) many of the buildings' fill pads (specifically those for Buildings 6 and 8 through 12) did not conform to the Soils Report and included highly expansive clays; (c) Terracon failed to properly test and monitor the construction of the fill pads permitting inadequate fill thickness and non-compliant material to be included; (d) the failure to properly design and construct the select fill pads is likely a major contributor to the unacceptable foundation performance of all of the Project's Buildings; (e) Terracon failed to meet the standard of care for a geotechnical engineer by providing inadequate PTI soil-support parameters for use in the design of the foundation slabs, which contributed to the foundation failures which I observed in the project.

Meyer's August 2011 report was also attached to appellant's response to Terracon's motion for summary judgment. In it, Meyer cited a 2007 report drafted by Holt Engineering, Inc., wherein "Holt opined that Buildings 6, 11 and 12 had experienced significant foundation movement and recommended foundation remediation" and recommended improvements to the surface drainage and installation of French drains around these four buildings." Holt further recommended the following: (1) "[p]lumbing leak tests of the sanitary sewer and domestic water supply systems for the four buildings";

(2) “that any leaks found should be documented and records maintained regarding the leak”; (3) that a Holt representative “be present during the testing”; (4) that “[a] leak test of the irrigation system” be performed; and (5) that repairs be made to the pavement including “a combination of sealing cracks and removal and replacement.” According to Meyer, “the Holt recommendations would have been partially effective at reducing some of the existing elevation differential and would provide some reduction of future movement.”

Meyer stated that Terracon drafted a report entitled Geotechnical Engineering Assessment regarding building 12, which presented an overview of the project and its history. Meyer set out that:

The floor surface survey of Building 12 and observed distress indicates significant foundation movement. In general the perimeter is higher than the interior. This type of distortion pattern is commonly referred to as edge lift and is representative of the clay soils around the perimeter of the foundation swelling more than the interior. It is likely that the breezeways were constructed with a ridge at the center of the building and were intended to drain both towards the front and the back of the building. The movement of the foundation has resulted in the slope of the rear portion of the breezeway reversing slope and not draining towards the rear.

Meyer documented that Terracon recommended remediation.

As to damage to the apartment complex, Meyer documented that the Terracon Report indicated that retaining walls on the site had “some minor distress cracking but that no structural failures were observed” and that

approximately 75% of the paved areas using flexible pavement exhibited distress. The majority of this distress was related to lateral movement producing tension cracks due to the subgrade moving, generally in a downhill direction. Some cases of alligator cracking were found and numerous areas of previously patched pavement were also observed. Since it would be impractical to stabilize the laterally moving subgrade, it is recommended that all the flexible pavement and hot mix be replaced with reinforced concrete. The new concrete pavement should consist of 12 foot by 12 foot modules with a thickness of 5 inches to resist the lateral movements of the subgrade. The pavement should be reinforced with #4 bars spaced at 12 inches on center each way with the reinforcing steel

continuous through the joints. The joints should be formed and contain a flexible joint filling material of 1/2 inch to 3/4 inch of asphaltic impregnated filler material. Slip dowels should not be used.

Meyer concluded that “The failure of [Terracon] to properly observe, test and monitor the select fill pad placements to conform to the recommendations in [Terracon’s own] report resulted in improper construction of the foundation systems and violated the Standard of Care for a testing laboratory.”

Meyer further stated:

The following conclusions are the writer’s opinions based on many years of experience dealing with similar soil and foundation situations. Should additional information become available, the writers reserve the right to determine the impact, if any, of the new information, and to revise opinions and conclusions if necessary and warranted:

1. Two sets of PTI soil support parameters were provided in the [Terracon] report of 2000 for the design of the foundations. One set for Buildings 1 through 5 and 7 and another for Buildings 6 and 8 through 12. Analysis shows that all PTI soil support parameters in the [Terracon] 2000 report were inadequate to properly characterize the site.

2. The structural plans from Alliance Structural Engineers, LLC are not in compliance with the [Terracon] recommendations for Buildings 6 and 8 through 12. The soil support parameters for the buildings on the Terrace deposits (for Buildings 1 through 5 and 7) were used for all the buildings.

3. The soil support parameters apparently used for Buildings 6 and 8 through 12 by Alliance would have required a select fill pad of about 9 feet. The foundation plans by Alliance do not specify a required thickness of select fill.

4. Based on [Terracon’s] 2008 interior borings and MLAW Test Pits, a fill pad depth ranging from less than 1 foot to over 7 feet was found beneath Buildings 6 and 8 through 12. These pad depths would not be sufficient to reduce the differential soil movement (Y_m) to that apparently assumed by Alliance in the foundation design.

5. The select fill pad was also found to contain inclusions of highly expansive clays which is the result of a construction defect.

6. [Terracon] failed to properly test and monitor the construction of the fill pads, permitting inadequate fill thickness and non-compliant material to be included.

7. The failure to properly design and construct the select fill pads is likely a major contributor to the unacceptable foundation performance of all Buildings.

8. Based on reports of the contractor, findings in other engineering reports and MLAW's field data and experience with this geologic formation, ground water is having a significant impact on the foundation movements.

9. Drainage provisions to quickly convey surface water away from certain portions of the foundation was recommended by both Holt and [Terracon]. Inadequate drainage was observed during MLAW's site inspections. The inadequate surface drainage is likely contributing to the negative performance of the foundations and is a result of a construction defect.

10. It is MLAW's opinion that surface drainage improvements and installation of French drains alone will not reduce the elevation differentials or future foundation movement to acceptable levels.

11. [Terracon] failed to meet the Standard of Care for a geotechnical engineer by providing inadequate PTI soil support parameters for use in the design of the foundation slabs. This contributed to the foundation failures observed in the project.¹⁰

12. Alliance failed to meet the Standard of Care for a structural engineer by failing to prepare design plans in compliance with the geotechnical report. This contributed to the foundation failures in the project.

13. The general contractor (Creekstone Builders) and the earthwork contractor (JTM Construction) failed to construct the select fill pads to minimum thickness and proper fill material quality. This contributed to the foundation failures in the project.

¹⁰ Meyer concluded, among numerous other things, that Terracon "failed to include vital laboratory-test data required by" the Post-Tensioning Institute's 2nd Edition Manual (the Manual) for design parameters for slab-on-grade foundations and that Terracon committed "errors and omissions in reporting recommended values of differential soil movement for center-lift and edge-lift conditions for its foundation-design recommendations." Specifically, appellant's expert concluded, among other things, that "Terracon miscalculated (under-reported) both the center-lift (shrinkage) and edge-lift (swell) factors by 200% and 775% respectively" for several of the buildings and that "[t]hese differences would cause the structural designer of the foundations to significantly under design the foundations for the site conditions." Appellant's expert also concluded that as to some of the other buildings, Terracon "significantly" miscalculated (under-reported) "by 189% (for shrinkage) and 450% (for swell)" of "the thickness of the select-fill soils for concrete slab-on-grade foundation pads," and that "these values were used by the structural designer to design the foundations and the foundations so designed would not have been stiff enough or strong enough for the actual site conditions at the project."

14. The asphaltic pavement was not constructed to meet the [Terracon] recommendations of October, 2000 report. Major pavement distress was noted and all asphaltic pavement should be replaced.

Appellant also attached an affidavit from Steve B. Johnson, in which Johnson stated that he was a licensed professional engineer by the State of Texas and employed as such in the Geotechnical Division of Holt Engineering, Inc. Johnson “was engaged to perform inspection and engineering evaluation of the site and structures” of buildings in appellant’s apartment complex. Johnson documented that he had observed: (1) “substantial cracking and significant drywall cracking in Buildings 6, 9, 11 and 12, and floor-sloping conditions in Buildings 6, 9, 11 and 12”;¹¹ (2) “moderate to large structural movement in Buildings 6, 9, 11 and 12, which included unlevel floors, cracks in the drywall, out-of-plumb door jambs, and movement of the stairways in the outside corridors”; and (3) “significant foundation movement that had occurred in Buildings 6, 11 and 12.” Photos of these damages to the buildings were included.

In addition, appellant attached an affidavit from Dean R. Read, a professional engineer who had “been actively engaged as a structural engineer, designing, analyzing and investigating foundations, structures, framing, retaining structures, pools and drainage for residential and commercial projects, including multi-unit residential apartment structures, since 1994 at MLAW Consultants & Engineers.” Read observed “distress and physical damage to the Buildings at the Project caused by the improperly designed and constructed foundations.”

¹¹ After its investigation, Terracon itself reported the “existence of drywall cracks, tape joint separations, misaligned doors, floor slopes, etc. inside building 12.”

Appellant attached a letter from Kyle Workman, a general contractor, giving an estimate of the costs of repairing the damages caused to appellant's apartment buildings.

Workman stated

I feel that all interior walls on the first floor and 25% of interior walls on upper floors will need to be re-taped, re-floated, and re-painted. The exterior of the buildings will likely show additional cracking that will require repair(s) as well, for which I believe 25% of the masonry/siding will need attention, as well as a portion of the roof. Workman estimated that it would cost \$6,011,624 to complete the remediation of the buildings.

The evidence set out above rises to a level that would enable reasonable and fair-minded people to differ in their conclusions that Terracon's alleged breaches caused damages to appellant's property." See *King Ranch, Inc.*, 118 S.W.3d at 751; *Reynosa*, 21 S.W.3d at 512. Thus, viewing the evidence in the light most favorable to appellant, crediting evidence favorable to appellant if reasonable jurors could, and disregarding contrary evidence unless reasonable jurors could not, see *Timpte Inds., Inc.*, 286 S.W.3d at 310, we conclude that appellant brought forth more than a scintilla of probative evidence to raise a genuine issue of material fact regarding whether Terracon breached the standard of care causing damages to appellant's property. See *King Ranch, Inc.*, 118 S.W.3d at 751. We sustain appellant's sub-issue to its first issue.

V. CONCLUSION

We reverse the trial court's summary judgment and remand the case for proceedings consistent with this opinion.

/s/ Rogelio Valdez
ROGELIO VALDEZ
Chief Justice

Delivered and filed the
26th day of February, 2015.